

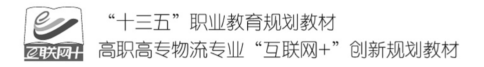
“十三五”职业教育规划教材 | 高职高专物流专业“互联网+”创新规划教材

物流专业英语（第2版）

仲颖 尹新 主编 | 丛倩 王慧 副主编 | 黄河 主审

50多条答案和注译，20多个参考视频，中英文对照阅读
选材力求反映物流学科发展趋势，紧扣现代物流热点问题

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WULIU ZHUANYE YINGYU

物流专业英语

（第2版）

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前　言

物流管理（Logistics Management）是在生产过程中，根据物料实体流动的规律，应用管理的基本原理和科学方法，对物流活动进行计划、组织、指挥、协调、控制和监督，使各项物流活动实现最佳的协调与配合，以降低物流成本，提高物流效率的活动。物流专业英语是在英语环境下培养具有物流管理基本能力的人才，使其掌握物流管理的最新动态，能进行物流英语的专业表述和实际应用的一项技能。

随着市场经济的不断发展，物流已在我国的社会经济生活中发挥了重要的作用。我国物流业虽然起步较晚，但发展迅速，并且顺应了经济全球化和信息技术化的大趋势。这样一来，与之相应的物流学科的有关内容也处于不断的发展与完善之中。物流活动已经成为社会经济的一项重要组成内容，掌握一定的物流专业词汇，有助于提高物流英语水平。本书也是为了培养全面化的物流人才而相应推出的。

关于本课程

物流专业英语是一门综合性很强的课程。物流本身被认为是营销学、管理学、供应链和众多技术科学的交叉产物，因此，物流专业英语的应用范围非常广泛。物流专业英语课程可以让学生在英语环境下理解物流的基本概念，体验物流的工作流程，设计物流的项目场景，模拟物流的工作环境等。本课程能够在较短的时间内，使学生在物流专业英语方面的能力有所提高。

关于本书

本书第 1 版于 2011 年 1 月出版，多次印刷，其简明实用的内容模块和生动活泼的编写风格颇受广大师生欢迎。本次修订主要对第 1 版中陈旧的内容进行了适当调整，对部分英语语法及词汇存在的差错进行了修改，还适当进行了版式调整，以使本书更加适合教学和阅读需要。

本书按照工学结合、模拟场景等人才培养模式的改革导向和教学过程“实践性、开放性和职业性”的改革重点要求，结合现代物流发展的实际问题编写。本书在选材上力求紧贴物流学科的发展趋势，反映现代物流的最新概念、技术与热点问题。全书由 12 个单元组成，基本上涵盖了现代物流管理中的供应链管理、物流运输、库存管理、物流包装、配送管理、绿色物流、国际物流、整合物流和物流单证等主要环节，可有力配合高职高专物流管理、国际货代等专业的教学，提高学生的知识视野和专业技能水平。

如何使用本书

本书内容可按照 48 学时安排，推荐学时分配为每个单元 4 学时。教师可根据不同的专业需要灵活安排学时，课堂重点讲解每个单元的主要内容，可以灵活地运用案例导入、话题讨论、学生演示、角色设计、模拟场景等教学方法。每单元相关练习可由学生在课后完成。

本书编写队伍

本书由江苏海事职业技术学院仲颖、南京铁道职业技术学院尹新担任主编，由南京科技职业学院丛倩、江苏海事职业技术学院王慧担任副主编。其他参编人员有南京交通职业技术学院余霞、陈乃源、徐凤，江苏海事职业技术学院高晓英、简耀，以及无锡商业职业技术学院钟茂林。全书由仲颖统稿，由江苏海事职业技术学院黄河主审。

本书具体编写分工为：仲颖编写 Chapter 1 和 Chapter 9，丛倩编写 Chapter 2 和 Chapter 3，钟茂林编写 Chapter 4 和 Chapter 5，王慧、简耀编写 Chapter 6，余霞编写 Chapter 7，陈乃源编写 Chapter 8，徐凤编写 Chapter 10，高晓英编写 Chapter 11，尹新编写 Chapter 12。

本书在编写过程中，还参考和引用了国内外相关文献资料，吸收和听取了许多行业资深人士的宝贵经验和建议。在此谨向对本书的编写、出版提供帮助的人士表示衷心的感谢！

由于编者水平有限，编写时间仓促，书中难免存在不妥之处，敬请广大读者批评指正。您的宝贵意见请反馈到电子信箱 sywat716@126.com。

编　者

2016 年 8 月

【资源索引】

目　　录



Chapter 1

Logistics Management



Case Study

Wal-Mart Wins with Logistics[①]

Kmart and Wal-Mart were two **retail merchandise chains** that, a few years ago, looked alike, sold the same products, sought the same customers, and even had similar names. When the race began, people were quite familiar with the "big red K", whose stores **dotted metropolitan** areas but few had heard of Wal-Mart, whose stores were in **rural** settings. **Considering** the similarity of the stores and their **mission**, **analysts attribute** the fates of the two chains **primarily to** differing management **philosophies**.

In 1987, Kmart was far ahead, with twice as many stores and sales of US $26 billion, compared to US $16 billion for Wal-Mart. With its **urban presence** and a focus on advertising, Kmart had more **visibility**. In contrast, Wal-Mart began in **stand-alone** stores outside small towns, luring customers away from the stores in **aging downtown**.



【参考视频】

Kmart **executives** focused on **marketing** and **merchandising**, even using Hollywood star Jaclyn Smith to promote her clothing line. By contrast, Sam Walton, Wal-Mart's founder, was **obsessed** with operations. He invested millions of dollars in a company-wide computer system linking cash registers to **headquarters**, **enabling** him to quickly **restock** goods. He also invested heavily in trucks and modern **distribution**



【国家标准】

① logistics [loˈdʒistiks, lə-] *n.* 物流，后勤 根据《中华人民共和国国家标准物流术语》（GB/T 18354—2006），物流是指“物品从供应地向接收地的实体流动过程。根据实际需要，将运输、储存、装卸、搬运、包装、流通加工、配送、回收、信息处理等基本功能实施有机结合”。

centers. Besides **enhancing** his control of the supply chain, these moves sharply reduced costs. While Kmart tried to improve its image and **cultivate** store **loyalty**, Wal-Mart kept lowering costs, betting that price would prove more important than any other **factor** in attracting customers. Wal-Mart's **incredibly sophisticated** distribution, **inventory**, and **scanner** systems meant that customers almost never **encountered depleted** shelves or price-check delays.

Meanwhile, Kmart's mounted, as distribution horror stories **abounded**. Employees lacked the training and skill to plan and control inventory properly, and Kmart's cash registers often did not have **up-to-date information** and would scan items and enter incorrect prices. This led to a **lawsuit** in California, and Kmart settled for US $985,000 for **overcharging** its customers .

Over the years, it has been Wal-Mart's focus on logistical matters that enables it to keep its prices low, its customer happy and returning often. Today, Wal-Mart is nearly six times the size of Kmart.

Kmart continued its focus on ad **circulars** and promotional pricing into the 21st century, whereas Wal-Mart continued to focus more on supply chain efficiency and less on advertising with the result that selling, administrative, and **overhead** costs were 17.3 percent for Wal-Mart and Kmart's were 22.7 percent. Wal-Mart was able to achieve prices that average 3.8 percent below Kmart's and even 3.2 percent below Target's. In 2002, Kmart went into **bankruptcy** and **reorganization**.

Outline

*Logistics management is a **fundamental** concept that has evolved to enable organizations to improve their efficiency and effectiveness in the 21st century. We start our study of logistics management by discussing the meaning of logistics management and important management activities in the logistics functions. Then we discuss the visibility of logistic system.*

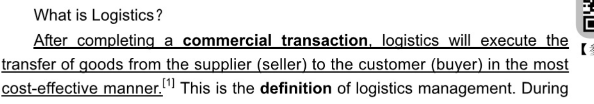
【Key Words】

retail [riːˈteilə]	*n.*	零售，零售地
merchandise chains [ˈməːtʃəndaiz]		商业连锁店
dotted [ˈdɔtid]	*adj.*	星罗棋布的
metropolitan [ˈmetrəˈpɔlitən]	*adj.*	大城市的，都市的
rural [ˈruərəl]	*adj.*	乡下的，田园的，乡村风味的
consider [kənˈsidə]	*v.*	鉴于，考虑到，顾及
mission [ˈmiʃən]	*n.*	使命，任务
analyst [ˈænəlist]	*n.*	分析家
attribute…to…		将……归结为……
primarily [ˈpraimərili]	*adv.*	首先，起初，主要的，根本上
philosophy [fiˈlɔsəfi]	*n.*	哲学，体系，达观，冷静

urban [ˈəːbən]	*adj.*	城市的
presence [ˈprezəns]	*n.*	出席，到场，存在
visibility [ˈviziˈbiliti]	*n.*	可见度，可见性，明显度，能见度
stand-alone	*adj.*	独立经营的
aging downtown		老城区
executive [igˈzekjutiv]	*n.*	主管人员
marketing [ˈmɑːkitiŋ]	*n.*	营销
merchandise [ˈməːtʃəndaiz]	*n.*	商品，货物
	vt.	买卖
obsess [əbˈses]	*vt.*	时刻困扰；缠住
headquarters [hedˈkwɔːtəz]	*n.*	总部，总店
enable [iˈneibl]	*vt.*	使能够；提供做……的权利，使可能
restock	*v.*	重新进货，再储存
distribution center [ˈdistriˈbjuːʃən]		配送中心
enhance [inˈhɑːns]	*v.*	提高，增强
cultivate [ˈkʌltiveit]	*v.*	培养，耕作
loyalty [ˈlɔiəlti]	*n.*	忠诚，忠心
factor [ˈfæktə]	*n.*	因素，要素
incredible [inˈkredəbl]	*adj.*	难以置信的，不可思议的
sophisticated [səˈfistikeitid]	*adj.*	老练的，老于世故的；精密的，尖端的
inventory [ˈinvəntəri]	*n.*	详细目录，存货清单
scanner [ˈskænə]	*n.*	扫描器，扫描仪
encounter [inˈkauntə]	*vt.*	遇到，遭遇 偶然碰到，邂逅
	n.	突然遇到
deplete [diˈpliːt]	*vt.*	使大大地减少；使空虚
abound [əˈbaund]	*vi.*	大量存在；充满，富于
up-to-date information		最新信息
lawsuit [ˈlɔːsuːt, ˈlɔːsjuːt]	*n.*	诉讼
overcharge [ˈəuvəˈtʃɑːdʒ]	*vt.*	对……要价过高
	n.	过高要价
circular [ˈsəːkjulə]	*adj.*	圆形的，环形的；循环的
	n.	通知，通告
overhead [ˈəuvəhed]	*adj.*	离地面的；头顶上的
	n.	管理费用
bankruptcy [ˈbæŋkrʌpsi]	*n.*	破产
reorganization	*n.*	重新组织



Text A The Definition of Logistics



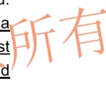


【参考视频】

What is Logistics?

After completing a **commercial transaction**, logistics will execute the transfer of goods from the supplier (seller) to the customer (buyer) in the most cost-effective manner.[1] This is the **definition** of logistics management. During the transfer process, **hardware** such as logistics facilities and equipment (logistics carriers) are needed, as well as information control and standardization. In addition, supports from the government and logistics association should be in place.

Logistics is a **unique** global "**pipeline**" that operates 24 hours a day;[2] seven days a week and 52 weeks a year, planning and **coordinating** the **transport** and **delivery** of products and service to customers all over the world. **Coming into being** with the advent of civilization, logistics is anything but a **newborn** baby.[3] However, when it comes to modern logistics, most **professionals** in the business consider it one of the most **challenging** and exciting jobs, **invisible** as it is.[4]









【参考视频】

Modern logistics is related to the **effective** and **efficient** flow of materials and information. They are of **vital** importance to customers and **clients** in various sections of the economic society which may include but by no means is limited to: **packaging**, **warehousing**, material handling, **inventory**, transport, **forecasting**, strategic planning, and customer service.

"Logistics is that part of the supply chain process that plans, implements and controls the efficient, effective flow and storage of goods, service and related

information from the point of origin to the point of consumption to meet customers' requirements." Although this definition fails to incorporate all specific terms used in the study of logistics, it does reflect the need for total movement management from point of material procurement to location of finished product distribution.

【Key Words】

commercial [kəˈməːʃəl] *adj.* 商业的，贸易的
transaction [trænˈzækʃən] *n.* 交易
definition [ˌdefiˈniʃən] *n.* 定义，解说
hardware [ˈhɑːdwɛə] *n.* 五金器具，硬件，部件
unique [juːˈniːk] *adj.* 唯一的，独特的
pipeline [ˈpaipˌlain] *n.* 管道；传递途径
coordinate [kəuˈɔːdineit] *vt.* 调整，整合
transport [trænsˈpɔːt] *n.* 运输，运输机
vt. 传送，运输，流放，放逐
delivery [diˈlivəri] *n.* 递送，交付，交货
come into being 形成，产生
newborn [ˈnjuːbɔːn] *adj.* 新生的，初生的
professional [prəˈfeʃənəl] *n.* 专业人员
adj. 专业的，职业的
challenging [ˈtʃæləndʒiŋ] *adj.* 富有挑战性的
invisible [inˈvizəbl] *adj.* 看不见的，无形的
effective [iˈfektiv] *adj.* 有效的
efficient [iˈfiʃənt] *adj.* 有效率的，能干的
vital [ˈvaitəl] *adj.* 重大的
client [ˈklaiənt] *n.* 顾客，客户，委托人
package [ˈpækidʒ] *n.* 包裹，包
warehouse [ˈwεəhaus] *n.* 仓库，货栈
vt. 储入仓库
inventory [ˈinvəntri] *n.* 存货，库存
forecast [ˈfɔː-kɑːst] *vt.* 预测

【Notes to Text A】


【对应翻译】

[1] After completing a commercial transaction, logistics will execute the transfer of goods from the supplier (seller) to the customer (buyer) in the most coot-effective manner.

"after completing a commercial transaction" 是以"介词+动词+ing"引导的时间状语。

[2] Logistics is a unique global "pipeline" that operates 24 hours a day.

这句的种修辞手法是比喻。比喻分为两类：明喻和暗喻。明喻称被比喻的物

体“像某个事物”，用“like”表示；暗喻称某个事物“是另一个事物”，用“is”表示。例如：“Jack looks like a wonder boy.”是明喻；“Jack is a wonder.”是暗喻。

[3] Coming into being with the advent of civilization, logistics is anything but a new-born baby.

“coming into being with…”意为“一直以来就和……一起”。

“anything but”意为“并非是，不是”，“nothing but”意为“就是，正是”，要注意两者的区别。

[4] However, when it comes to modern logistics, most professionals in the business consider it one of the most challenging and exciting jobs, invisible as it is .

“invisible as it is”是一个倒装句句式，表示“尽管……”，“as”前面可加动词或形容词。例如：

Child as he is, he makes a living on his own. 尽管他还是小孩，但已经自己谋生了。

Difficult as it is, we still encourage each other. 尽管很困难，但我们仍然互相鼓励。

【Exercises to Text A】

【参考答案】

Ⅰ. Fill in the blanks.

1. Logistics is a unique global “__________” that operates 24 hours a day; 7 days a week and 52 weeks a year.

2. Coming into being with the advent of civilization, logistics is anything but a __________baby.

3. Logistics is that part of ______________________________ process that plans, implements and controls the efficient, effective flow and storage of goods, service and related information from the point of origin to the point of consumption to meet customers' requirements.

Ⅱ. True or false.

1. When it comes to modem logistics, most professionals in the business consider it one of the worst jobs. ( )

2. Modern logistics is related to the effective and efficient flow of materials and information. ( )

3. Modern logistics may include only: packaging, warehousing, material handling, inventory, transport, forecasting, strategic planning, and customer service. ( )

Ⅲ. Translation.

1. During the transfer process, hardware such as logistics facilities and equipment (logistics carriers) are needed, as well as information control and standardization. In addition, supports from the government and logistics association should be in place.

2. Logistics is a unique global "pipeline" that operates 24 hours a day; seven days a week and 52 weeks a year, planning and coordinating the transport and delivery of products and service to customers all over the world.

3. Modern logistics is related to the effective and efficient flow of materials and information are of vital importance to customers and clients in various sections of the economic society which may include but by no means is limited to: packaging, warehousing, material handling, inventory, transport, forecasting, strategic planning, and customer service.

4. Logistics is that part of the supply chain process that plans, implements and controls the efficient, effective flow and storage of goods, service and related information from the point of origin to the point of consumption to meet customers' requirements.

Text B Develop Systems Visibility to Material Shipment

Up-to-the-minute information **concerning** the status and location of **shipments** can provide at least partial visibility that is required for total material control.[1] The need for control supports the development of electronic data and **communications systems** between **carrier** and buyer. Third-party logistics② companies should be able to provide **immediate access to information** on shipment status, whether on motor carriers linked electronically with shippers through **global positioning systems** or on a ship, aircraft, or customs' location. [2]

Many 3PLs offer detailed shipment **tracking systems** to provide current status updates. Several levels of **complexity** exist in these systems. One-way information systems allow a buyer to gain information about the location of a shipment on a real time basis. A buyer simply requests data directly from a carrier's information system now often provided via the carrier's **website**.

② third-party logistics　第三方物流（缩写为 3PL）　根据《中华人民共和国国家标准物流术语》（GB/T 18354—2006），第三方物流是指"接受客户委托为其提供专项或全面的物流系统设计及系统运营的物流服务模式"。



However, many 3PLs now **utilize event-based systems**. These provide status **alerts** via e-mail, fax, pager, and so on, to a buyer or salesperson that a particular shipment has been delayed and that this may affect other entities in the supply chain (e.g., manufacturing plants, warehouse locations, and customers). Even though **problematic** events cannot always be prevented, early warning signals, using an event-management system, can help sourcing companies deal with the problem in a more timely manner. This allows a buyer to realize improved service and greater benefits that otherwise might not be available through a traditional, **arm's length** business relationship.[3] For example, a buyer may receive a **guarantee** that carrier equipment will be available when and where needed. Controlling and managing the movement of goods is easier and more efficient when a buyer selects only the best 3PLs available and develops a closer working relationship with them.

【Key Words】

up-to-the-minute *adj.* 最新的，最近的，直到现在的
concerning [kən'sɜːniŋ] *prep.* 关于，就……而言
shipment [ʃiːp'mənt] *n.* 发货，运载的货物
communication system 通信系统，信息系统
carrier ['kæriə] *n.* 承运人，载体；运送者，运输公司
immediate [i'miːdiət] *adj.* 立即的；直接的；最接近的
access to information 信息获取
global positioning system 全球定位系统（简称 GPS）
tracking system 跟踪系统，追踪系统
complexity [kəm'pleksəti] *n.* 复杂，复杂性，复杂错综的事物
website ['wɛbsait] *n.* 网站
utilize ['juːtilaiz] *vt.* 利用
event-based system 事故预警系统
alert *v.* 通知，使……警觉
n. 警报，警戒状态，通告

problematic [prɒblə'mætik] *adj.* 问题的，有疑问的，不确定的
arm's length 公平的；保持距离；一般交易关系
guarantee [gær(ə)n'tiː] *n.* 保证，担保，保证人，保证书，抵押品
vt. 保证，担保

【Notes to Text B】


【对应翻译】

[1] Up-to-the-minute information concerning the status and location of shipments can provide at least partial visibility that is required for total material control.

"Up-to-the-minute" 意为"目前为止的"，这种结构为复合词。

复合词是英语中一大类词汇，通常以"-"连接单词构成，或者采用短语构成，一般有复合名词、复合形容词、复合动词等形式。

[2] Third-party logistics companies should be able to provide immediate access to information on shipment status, whether on motor carriers linked electronically with shippers through global positioning systems or on a ship, aircraft, or customs' location.

"whether on motor carriers linked electronically with shippers through global positioning systems or on a ship, aircraft, or customs location" 是"whether"引导的定语从句。

[3] This allows a buyer to realize improved service and greater benefits that otherwise might not be available through a traditional, arm's length business relationship.

"arm's length business relationship" 意为"公平交易关系"；"Arm's Length Principle" 意为"公平交易原则"。

【Exercises to Text B】


【参考答案】

Ⅰ. Fill in the blanks.

1. Up-to-the-minute information ________ the status and location of ________ can provide at least partial ________ that is required for total material control.

2. Third-party logistics companies should be able to provide ________ to information on shipment status, whether on motor carriers linked electronically with shippers through ________ or on a ship, aircraft, or customs' location.

3. Many 3PLs offer detailed shipment ________ systems to provide current status updates.

4. A buyer simply requests data directly from a carrier's information system now often provided via the carrier's ________.

5. However, many 3PLs now ________ event-based systems. These provide status ________ via e-mail, fax, pager, and so on, to a buyer or salesperson that a particular shipment has been delayed and that this may affect other entities in the supply chain (e.g., manufacturing plants, warehouse locations, and customers).

6. This allows a buyer to realize improved service and greater benefits that otherwise might not be available through a traditional, __________ business relationship.

Ⅱ. Translation

1. 物流货物可掌控的要求支持了承运商和客户之间的电子数据和通信系统发展。

2. 这些系统存在不同程度的复杂性。

3. 即使问题事件不能完全制止，使用事件预警系统提供早期预警信息能够帮助公司及早进入问题应对状态。

4. 单向信息系统允许买方获得实时的运输地点信息。

5. 买方可以获得承运方随时随地设备待命的保证。



Reading Material A

P.G. Logistics[③]

PGL provides total solutions as logistics and supply chain. PGL provides customers with optimized logistics network design, planning, operations, management and information related to supply chain management.

PGL has established more than 40 subsidiaries or branch offices in main cities across the nation, forming a service network that supports nationwide distribution. In addition, there are PGL offices in Hong Kong, Thailand and Australia to develop international business. In 1997, PGL was the first logistics company that applied Internet/Intranet system to logistics information for servicing customers.

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③ P. G. Logistics　宝供物流（缩写为 PGL）　我国目前最具规模、最具影响力、最领先的第三方物流企业之一，官网为 http://www.pgl-world.com/。


【参考视频】



用 心 为 你 创 造 价 值

"Creating value for our customers" is the core operating principle of PGL. There are various professional talents who fully understand Chinese situation and western advanced management. PGL implements new technology, effective information systems and management practices in daily work, and continually improves operation reliability and customer satisfaction through a set of standards and procedures. As a result, PGL is recognized by its customers as one of best logistics suppliers in China. And some of customers formed a strategic partnership with PGL in a long run.

Recently, PGL is to build up about 10 distribution centers equipped with high efficient and advanced facilities and equipment, such as RF, dock leveler, racking and WMS systems etc. . The size of these distribution centers will be varied from 150,000 to 700,000 square meters. With completion of new distribution centers, PGL will have an effective and responsive distribution network across China to support , but not limited to the following:

(1) Warehousing and inventory management.

(2) Dispatching and transportation management.

(3) Distribution in cities.

(4) Order management.

(5) Cross docking.

(6) Value added service such as labeling, cutting, repackaging etc..

(7) Product shows.

(8) Financial Transitions.

(9) Information providing and sharing.

(10) Customs Clearance and inspections related to import and export.

(11) Logistics research and development, training service.

All in all, PGL will provide integrated total supply chain solutions to customers both at home and abroad for them to grow their business.

【Key Words】

talent [ˈtælənts]	*n.*	人才；才能，天赋
reliability [riˌlaiəˈbiləti]	*n.*	可靠性 可靠性 信度 可靠度
partnership [ˈpɑːtnəʃip]	*n.*	合伙；合伙企业；合作关系

RF		Radio Frequency 的缩写，即无线射频
dock leveler		装卸跳板
racking ['rækiŋ]	*n.*	推压
	v.	折磨；
	adj.	拷问的；折磨人的
WMS system		Warehouse Management System 的缩写，即仓库管理系统
cross docking		直接换装；交叉配送；交叉转运；越库管理
integrated ['intigreitid]	*adj.*	综合的；完整的
	v.	整合

【Questions】

1. Discuss the functions of the logistics.
2. Give some examples to illustrate the importance of a firm's logistical activities.



Reading Material B

GM[4] Develops Vector as Its Fourth-Party Logistics[5] Provider

To deal with increased complexity in a **build-to-order** environment, GM **sought** a 4PL partner within the logistics industry for the following reasons:

(1) Avoid/defer structural or **fixed costs**, and drive more costs to variable.

(2) Gain access to specialized logistics resources.

(3) Rapidly develop and **deploy cutting-edge** IT logistics solutions.

(4) Provide a single point of organizational **accountability** responsible for managing logistics activities.

A 4PL is a **distinctive** business model that extends outsourcing to new levels as it combines the best **capabilities** and technologies from logistics companies and other service organizations to deliver value through total supply chain management. Selecting a non-asset-based provider that is **neutral** with respect to selecting logistics shippers and materials management providers is a must.

GM's supply chains **were integrated with** logistics processes and IT management controlled by a 4PL, **leveraging** multiple service providers. Why was it important for GM to go with a 4PL? To reduce the cost of GM's huge logistics network, which includes raw materials providers (such as steel), customs brokers, 3PL providers, first and second-tier component suppliers, freight forwarders, **assembly** operations, original equipment manufacturers, distribution centers, new

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④ GM　通用汽车公司（全拼是 General Motors）　美国汽车制造公司，成立于 1908 年，总部设在美国底特律文艺复兴中心，其核心汽车业务及子公司遍布全球。

⑤ Fourth-Party Logistics　第四方物流（缩写为 4PL）　第四方物流为物流业者提供一个整合性的物流，是专门为第一方物流、第二方物流和第三方物流提供物流规划、咨询、物流信息系统和供应链管理等的活动。

vehicle dealers, parts and service dealers, and 3PL distributors of aftermarket parts. Looking at this **hugely** complex network, GM's logistics team realized that nobody can do it all and that GM wasn't capable of managing this network themselves either. To cope with this complexity, GM signed a contract with CNF to form a 4PL **joint venture** called Vector SCM.



GM will be able to do the following:

(1) Retain strategic planning, benchmark, and operational **competency**.

(2) Have **board representation** and **super-majority** rights on critical issues.

(3) Reduce logistics costs through a gain share agreement.

(4) Avoid **significant** IT development costs.

(5) Provide full accountability to GM Global Logistics for all aspects of logistics Performance.

Vector will do the following:

(1) Manage GM's current global network of logistics service providers.

(2) Manage GM's global tactical and operational logistics activities.

(3) Enable logistics capabilities (visibility, speed, flexibility, and reliability).

(4) Provide **best-of-breed** logistics technology.

(5) Provide people, process, and technology to support GM global logistics operations.

(6) Part with leaders in the industry to build, buy, or leverage skills and technology.

GM and Vector SCM have created common global solutions across logistics networks through the use of regional Logistics Control Centers. Vector assumed the responsibility of managing approximately one third of GM's logistics spend. The gradual transition of responsibility to Vector SCM is well under way, managed through a disciplined business case process, involving discovery of opportunities, business case development, implementation, and business case approval. This has required major changes in the way that GM works and allows it to focus on its core competency of designing and building value for the end customer in the form of new vehicles and services.

【Key Words】

build-to-order		按单生产，定制生产
sought [sɔːt]	*v.*	寻找（seek 的过去式和过去分词）

fixed cost		固定成本（可变成本 variable cost）
deploy [diˈplɔi]	*vt.*	配置；展开
	n.	部署
cutting-edge [ˈkʌtiŋˈedʒ]	*n.*	（刀片的）刃口；尖端；前沿
	adj.	先进的，尖端的
accountability [əˌkauntəˈbiliti]	*n.*	义务；责任
distinctive [diˈstiŋ(k)tiv]	*adj.*	有特色的，与众不同的
capabilities	*n.*	能力（capability 的复数）；功能；性能
neutral [ˈnjuːtr(ə)l]	*adj.*	中立的，中性的；中立国的；非彩色的
	n.	中立国
be integrate with		使与……结合
leveraging	*n.*	杠杆作用；举债经营
	v.	利用贷款进行投机（leverage 的 ing 形式）
assembly [əˈsembli]	*n.*	装配；集会，集合
hugely [ˈhjuːdʒli]	*adv.*	非常
joint venture		合资企业
competency [ˈkɒmpitənsi]	*n.*	能力；资格
board representation		董事会代表
super-majority	*n.*	多数
significant [sigˈnifik(ə)nt]	*adj.*	重大的；有效的；有意义的
	n.	象征
best-of-breed		单项优势；最佳组合

【Questions】

1. What is the fourth-party logistics provider?
2. What is the difference between the 3PL and 4PL?



参考译文[⑥]

第1章 物流管理

案例分析

沃尔玛赢在物流

凯马特（Kmart）和沃尔玛（Wal-Mart）是两大零售商业连锁店，几年前，它们很相似，销售同样的产品，寻找同样的客户，甚至有着相近的名字。在竞争刚开始时，人们对大红色的K字（凯马特的标志）耳熟能详，凯马特的商店大多设在城市，但是知道远在边远郊区的沃尔玛的人却寥寥无几。在综合考虑这两家的店铺和职责的相似性后，分析者将它们不同的命运归结于它们不同的管理理念。

在1987年，凯马特遥遥领先于沃尔玛，店面数是沃尔玛的两倍，销售额为260亿美元，而沃尔玛仅为160亿美元。凯马特凭借其都市形象与广告，吸引着大众的眼球。与此相反的是，沃尔玛在小镇之外设立独资商店，以吸引那些老城区以外的客户。

凯马特的管理者们侧重于市场与促销，甚至邀请好莱坞明星杰奎琳·史密斯来推广她的系列成衣。相反，沃尔玛的创始人（山姆·沃尔玛）则侧重于经营，他投入上百万美元发展公司计算机系统，使收银台和总部之间联网，以便快速补货。他同时大力投资卡车和配送中心。这些措施除了增强他对供应链的控制之外，也极大地降低了成本。当凯马特努力提高形象及培养客户忠诚度时，沃尔玛却在持续降低成本，它认为在吸引客户方面，价格才是最重要的因素。沃尔玛极其复杂的配送、存货和扫描系统意味着客户们将永远不会遇到像商品缺货及价格查验延迟之类的问题。

同时，凯马特的潜在配送事故发生了。因为雇员缺少培训和相应的技能来恰当地计划和控制库存，收银台信息常常不能被及时更新，所以扫描后会出现不正确的价格。这导致了一起发生在加利福尼亚州的客户诉讼，因为向客户超额结算，凯马特被判赔偿客户985 000美元。

多年来，正是因为沃尔玛致力于物流管理才使得其产品价格低，客户满意，回头客增多。今天，沃尔玛的规模已经几乎是凯马特的6倍。

直到21世纪，凯马特继续致力于循环广告和促销价格，而沃尔玛也继续侧重于供应链，很少关注广告，结果是沃尔玛的销售、行政及管理费用只占其成本的17.3%，而凯马特则达到22.7%。沃尔玛的价格可以比凯马特平均低3.8%，并比塔吉特百货（Target）低3.2%。2002年，凯马特进入破产和重组阶段。

Text A

物流的定义

什么是物流？

在完成商业交易之后，物流以最大的成本效益，将货物从供应商（卖家）转移到客户（买家）。这就是物流的定义。在物流过程中，硬件设施如物流装置和设备（载重卡车）是必需的，

⑥ 本书译文仅供参考，以便读者理解文章。

信息控制和标准化也同样不可缺少。此外，政府和物流协会对物流公司的支持必须到位。

物流是一个独特的全球性的“通道”，每天 24 小时动作；它一星期 7 天，一年 52 周，计划及协调运输，并将产品和服务交付到全世界的客户手中。文明社会伊始，物流就已经存在，因而不是新鲜事物。然而说到现代物流，大部分专业人士认为，尽管看不见、摸不着，物流却是最有挑战性和刺激性的工作之一。

现代物流关系到货物流和信息流的有效性和高效率。对于经济社会各个中间商和消费者来说，货物流和信息流是非常重要的，它包括但绝非局限于：包装、仓储、转移、存储、运输、预测、战略规划和客户服务几个方面。

“物流是供应链过程的一部分，它计划、实施和控制着高效的货物流动和储存、服务及从起始点到消费终点的相关信息，高效、有效地满足客户的要求。”虽然以上定义与物流研究中所有的专业术语都大相径庭，但它反映了从物资采购点到成品分销地的整个货物流向管理的需要。

Text B

物流可视性要求提高

货物运输地点和状态的当前信息至少能够提供部分物流可视性，而物流可视性是全面掌控货物所要求的。物流货物可掌控的要求支持了承运商和客户之间的电子数据和通信系统发展。第三方物流公司应该能够提供运输状态信息的及时获取，不管是在通过全球定位系统联系的汽车上，还是在轮船、飞机或者客户地点上。

很多第三方物流商通过详细的运输追踪系统来提供当前状态更新。这些系统存在不同程度的复杂性。单向信息系统允许买方获得实时的运输地点信息。以前买方仅仅要求直接获得运输信息，现在则常常通过承运方网址提供。

然而很多第三方物流商采用事件预警系统。他们通过电邮、传真、寻呼等向买方或卖方提供状态提醒，提醒某单运输已经延迟并且可能影响供应链上的其他公司（比如制造工厂、仓库位置和客户等）。即使问题事件不能完全制止，使用事件预警系统提供早期预警信息能够帮助公司及早进入问题应对状态。这种合作可以让买方实现服务提高和利润增值，而这在传统的买卖公平的交易关系中是做不到的。例如，买方可以获得承运方随时随设备待命的保证。当买方选择了最好的第三方物流供应商并和它们建立亲密的合作关系时，货物物流中的管理和控制将变得更加高效方便。

阅读材料 A

宝 供 物 流

宝供物流提供物流和供应链的全面解决方案。宝供物流为客户提供优化的物流网络设计、物流规划、运作、管理和与供应链管理相关的信息。

宝供物流在国内的中心城市设立了 40 多家全资的分公司和办事处，形成了覆盖全国的服务网络。同时，它还在中国香港、泰国和澳大利亚等地建立了办事机构，国际化业务初具规模。1997 年，宝供集团率先建立了基于国际互联网/企业内部网的物流信息系统，为客户提供服务。

"为客户创造价值"是宝供物流的核心经营理念。它汇集了一批既深谙中国国情又掌握西方管理方法的各类专业人才。宝供物流在日常业务中运用高新技术、高效的信息系统和管理经验，并通过一系列标准和操作程序不断提高物流运作的可靠性和客户满意度。因此，宝供物流备受国内外客户的信赖，被客户认为是中国最好的物流供应商之一。一些客户与宝供物流建立了长期战略合作关系。

最近，宝供物流又将兴建10个拥有如无线射频、货架系统、装卸设备和仓储管理系统等高效先进的设施和设备的配送中心。配送中心面积在15～70万平方米。新的配送中心建成后，宝供物流将有一个跨越全中国的有效反应配送网络，其支持但并不仅限于以下功能：

（1）仓储和库存管理。

（2）分拨和运输管理。

（3）城市间的配送。

（4）订单管理。

（5）越库管理。

（6）增值服务，如贴标签、切割、重包装等。

（7）产品展示。

（8）金融结算。

（9）信息枢纽和发布。

（10）一关三检。

（11）物流科研培训服务。

总之，宝供物流为国内外客户拓展业务提供全套的集成物流及供应链解决方案。

阅读材料B

通用汽车使用Vector作为第四方物流供应商

为了应对当前按单生产形势下复杂性增加的问题，通用汽车因为以下原因寻求第四方物流合作伙伴：

（1）避免/延长结构型或固定成本，驱动更多的成本为可变成本。

（2）探寻专业物流资源的路径。

（3）快速发展并部署先锋IT物流解决方案。

（4）提供组织结构问责制中负责管理物流行为的单一责任点。

第四方物流是一种独特的商业模式，将外包扩展到一个新的水平，因为它结合了物流公司和其他服务组织最好的能力和技术，以便在整个供应链管理中传递价值。选择一个非资产基础的，在物流运输和材料管理中维持中立的物流供应商是一种必须。

通用汽车的供应链是由第四方物流商通过物流过程及IT管理整合到一起，用来平衡多种服务提供商。为什么通用汽车和第四方物流的配合如此重要？为了降低通用汽车巨大的物流网络成本，该网络包括原材料供应商（比如钢铁商）、客户经纪人、第三方物流供应商、第一和第二层零部件供应商、运输货代、集成运作、原始设备制造商、配送中心、新汽车分销商、部件和服务分销商及售后的第三方物流配送等。面对这巨大庞杂的网络，通用汽车的物流团队意识到没有人能够全部完成，通用汽车自己也管理不了这个巨网。为了应对复杂状况，通用汽车和CNF（公司名）签署合同成立第四方物流合资企业，名为Vector SCM。

通用汽车将做到以下方面：

（1）保持策略计划、评估和营运能力。

（2）在重大事件上拥有董事会代表和多数决策权。

（3）通过股份协议降低物流成本。

（4）避免巨大的 IT 开发成本。

（5）向通用汽车全球物流提供全部问责制，并由其负责所有的物流事项。

Vector 将做到以下方面：

（1）管理通用汽车提供物流服务的当前全球网络。

（2）管理通用汽车的全球物流战略和运营行为。

（3）保证物流能力（可视性、速度、灵活性和可靠性）。

（4）提供行业最好的物流技术。

（5）为通用汽车全球物流运营提供人员、流程和技术支持。

（6）和行业内的领军人物合作以建造、购买或者影响技能和技术。

通用汽车和 Vector SCM 通过使用区域物流控制中心在物流网络中产生全球共同方案。Vector 保证管理职责只会花费通用汽车物流费用的 1/3 左右。通过训练有素的业务案例流程，包括机会发现、业务案例拓展、履行和认可等，向 Vector SCM 的责任转移正在有条不紊地分步进行。这大大改变了通用汽车的工作方式，并且让其主要精力集中于核心能力，即为终端客户提供新汽车的设计、制造和服务。



Chapter 2

Supply Chain Management



Case Study

Beer Game and Bullwhip Effect[7]

The Beer Game was originally invented by Jay Forrester at MIT[8] Sloan School of Management[9] in early 1960's. It is a simulation game that can be used to **demonstrate** the benefits of information sharing, **e-collaboration** in the supply chain and a number of key principles of supply chain management.

Before a game begins, something about the game must be known:

1. Roles

(1) There are four roles in the game: retailer, **wholesaler**, distributor and manufacturer. See Figure 2.1.

(2) Each role from different company is each other's customer or supplier in a supply chain.

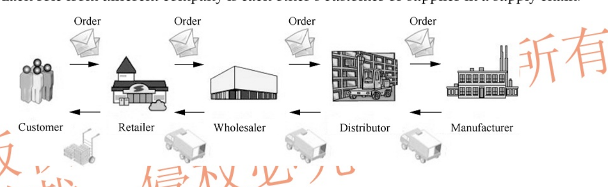


Figure 2.1 Roles in the game

2. Ground rules

(1) A game extends over a **fictitious** year and covers 52 rounds of one week each. You cannot take a break in the entire game.

(2) For the sake of **simplicity**, everyone sells only one product: Lover's Beer. One unit = One crate of beer.

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⑦ bullwhip effect　牛鞭效应　牛鞭效应是经济学的一个术语，供应链管理的基本原理之一，指的是供应链上的一种需求变异放大现象，是信息流从最终客户端向原始供应商端传递时，无法有效地实现信息的共享，使得信息扭曲而逐级放大，导致了需求信息出现越来越大的波动，此信息扭曲的放大作用在图形上很像一根甩起的牛鞭，因此被形象地称为牛鞭效应。可以将处于上游的供应方比作梢部，下游的用户比作根部，一旦根部抖动，传递到末梢端就会出现很大的波动。

⑧ MIT　麻省理工学院　世界上最杰出的理工大学之一。

⑨ MIT Sloan School of Management　麻省理工学院斯隆商学院　前身是麻省理工学院 1895 年班的 Alfred P. Sloan（当时为通用汽车总裁）于 1952 年捐助 500 万美元成立的产业管理学院（School of Industrial Management）。1964 年该学院改名为斯隆管理学院（Alfred P. Sloan School of Management）以感谢赞助者。斯隆商学院被认为是美国最杰出的商学院之一，在 2005 年被《美国新闻与世界报道》杂志评选为美国排名第四的商学院，仅次于哈佛商学院、斯坦福大学商学院和宾夕法尼亚大学沃顿商学院。

(3) There are three costs involved in the game: inventory carrying costs=US $1/case/week; the **backlog** costs=US $2/case/week; total cost = sum of costs at all four stages.

(4) Goal is Minimizing Total Supply Chain Cost! You need to do all the calculations, and decide how much you will order each week.

(5) It takes two weeks for replenishment order to reach; shipment time is also two weeks.

(6) All demand is to be satisfied! If for some reason you cannot deliver, the product is noted as backlog and you must deliver this order next time you have products in stock.

(7) NO COMMUNICATION BETWEEN STAGES! Retailers must not reveal actual customer orders!

(8) Players must not exchange any information other than that constituted by the order itself.

3. Course of the game

In each round, the following happens(see Figure2.2):

(1) You receive goods from the supplier.

(2) You receive orders from the customer.

(3) You deliver to the customer as ordered.

(4) You order new goods.

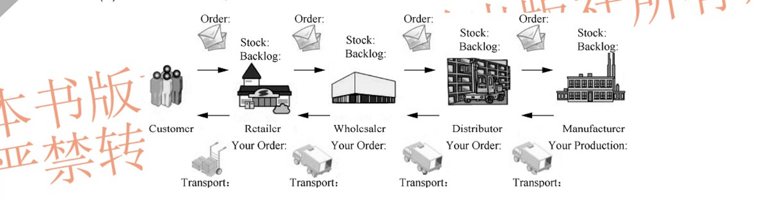
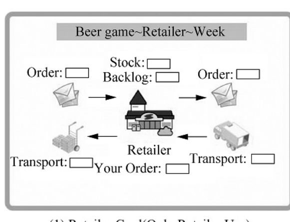
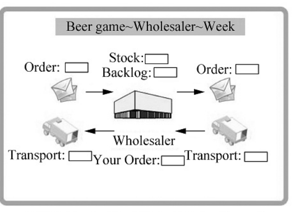


Figure 2.2 Course of the game

4. Figures and diagrams(see Figure2.3)

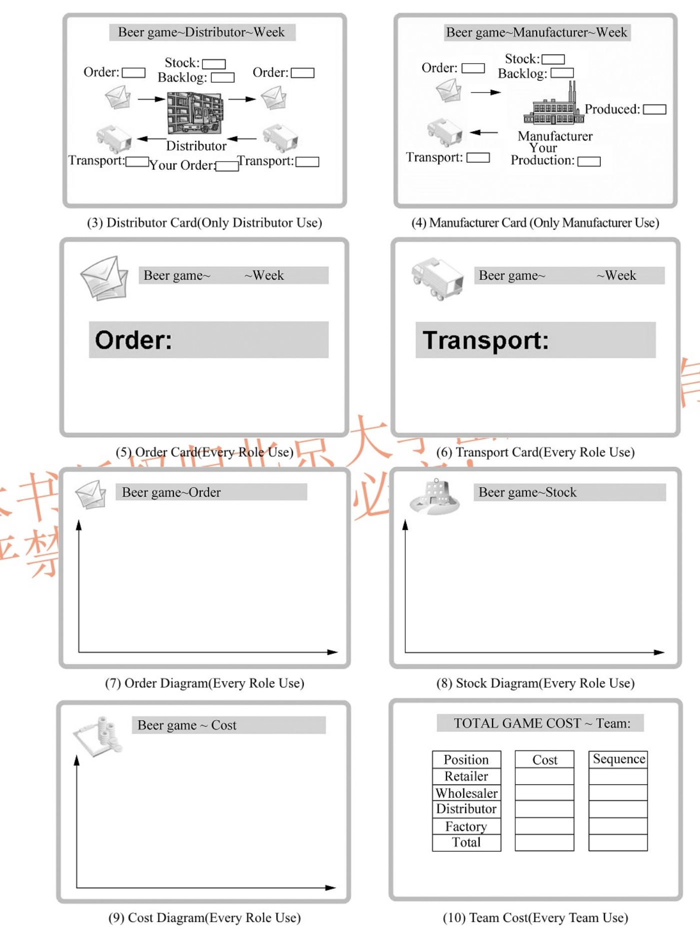


(1) Retailer Card(Only Retailer Use)



(2) Wholesaler Card (Only Wholesaler use)

Figure 2.3 Figures and diagrams



(3) Distributor Card(Only Distributor Use)

(4) Manufacturer Card (Only Manufacturer Use)

(5) Order Card(Every Role Use)

(6) Transport Card(Every Role Use)

(7) Order Diagram(Every Role Use)

(8) Stock Diagram(Every Role Use)

(9) Cost Diagram(Every Role Use)

(10) Team Cost(Every Team Use)

Figure 2.3 Figures and diagrams(next)

5. Start the game

(1) Several games can take place at once, and several teams can therefore play against each other at the same time.

(2) Teacher plays the leader role in the game, to order 4 cases each week to the retailer in the first 4 weeks. From 4th week on, the leader can order any quantity.

(3) The game will last 50 weeks, but can be concluded at any time before that by the game leader.

Now, the game leader starts the Game!



Outline

The results are shown in figures and diagrams when the game is over. Maybe most of the players feel frustrated because you are not getting the results you want. Feelings of confusion and disappointment are common. In the beer game players enact a four stage supply chain. Because communication and collaboration are not allowed between supply chain stages, players invariably create the so called bullwhip effect.

The beer game is a role-play supply chain simulation that lets us experience typical supply chain problems. The purpose of the game is to meet customer demand, through a multi-stage supply chain with minimal expenditure on back orders and inventory.

Prepare an analysis of the usage of the concepts you've learnt through the Beer Game.

(1) How can the performance be improved?

(2) What are the important factors affecting supply chain performance?

(3) How can IT help in improving supply chain performance?

【Key Words】

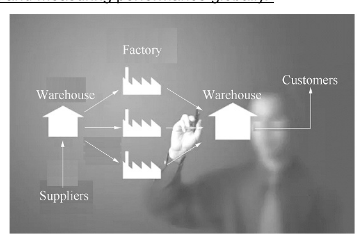
demonstrate [ˈdemənstreit]	*v.*	论证，示范，展示
e-collaboration [ikəˌlæbəˈreiʃən]		电子协作
wholesaler [ˈhəulˈseilə]	*n.*	批发商
fictitious [fikˈtiʃəs]	*adj.*	假想的，编造的，虚伪的
simplicity [simˈplisiti]	*n.*	单纯，简朴，坦率
backlog [ˈbæklɔːg]	*n.*	积压的事务
	vt.	储备，积压



Text A　Introduction to Supply Chain Management

Supply Chain Management (SCM) is the management of the flow of goods and services. <u>It includes the movement and storage of raw materials, work-in-process inventory, and finished goods from point of origin to point of consumption.</u> [1] <u>**Interconnected** or **interlinked** networks, channels and node businesses are involved in the **provision** of products and services required by end customers in a supply chain.</u>[2]

Supply chain management has been defined as the "design, planning, **execution,** control, and **monitoring** of supply chain activities with the objective of creating net value, building a competitive **infrastructure**, **leveraging** worldwide logistics, **synchronizing** supply with demand and measuring performance globally."[3]





【参考视频】

A simple supply chain is made up of several elements that are linked by the movement of products along it.[4]

(1) Customer: The supply chain starts and ends with the customer. A customer starts the chain of events when he decides to purchase a product that has been offered for sale by a company. The customer contacts the sales department of the company, which enters the sales order for a specific **quantity** to be delivered on a specific date. If the product has to be manufactured, the sales order will include a requirement that needs to be fulfilled by the production **facility**.

(2) Planning: The requirement **triggered** by the customer's sales order will be **combined** with other orders. The planning department will create a production plan to produce the products to fulfill the customer's orders. To manufacture the products the company will then have to purchase the raw materials needed.

(3) Purchasing: The purchasing department receives a list of raw materials and services required by the production department to complete the customer's orders. The purchasing department sends purchase orders to selected suppliers to deliver the necessary raw materials to the manufacturing site on the required date.

(4) Inventory: The raw materials are received from the suppliers, checked for quality and **accuracy** and moved into the warehouse. The supplier will then send an invoice to the company for the items they delivered. The raw materials are stored until they are required by the production department.

(5) Production: Based on a production plan, the raw materials are moved inventory to the production area. The finished products ordered by the customer are manufactured using the raw materials purchased from suppliers. After the items have been completed and tested, they are stored back in the warehouse prior to delivery to the customer.

(6) Transportation: When the finished product arrives in the warehouse, the shipping

department determines the most efficient method to ship the products so that they are delivered on or before the date specified by the customer. When the goods are received by the customer, the company will send an invoice for the delivered products.

【Key Words】

interconnected [ˌintəkəˈnɛkt]	*adj.*	连通的；有联系的；互联的；相互连接的
interlinked[ˌintəˈliŋkt]	*adj.*	互连的
provision[prəˈviʒən]	*n.*	供应；供应物；粮食；食物；给养
execution[ˌeksiˈkjuːʃən]	*n.*	履行，执行，贯彻，完成；实现，实施，施行
monitoring[ˈmɔnitəriŋ]	*n.*	监视，监控；检验，检查
	v.	监视，监听，监督（monitor 的 ing 形式）
infrastructure[ˈinfrəˌstrʌktʃə]	*n.*	基础；基础结构，基础设施；
leveraging[ˈliːvəridʒiŋ]	*n.*	杠杆作用；优势；影响力，作用力
	v.	利用贷款进行投机（leverage 的 ing 形式）
synchronizing[ˈsiŋkrənaiziŋ]	*v.*	同步（synchronize 的 ing 形式）
	adj.	同步的
quantity[ˈkwɔntiti]	*n.*	量，数量
facility[fəˈsiləti]	*n.*	设施；设备；容易；灵巧
triggered[ˈtrigəd]	*v.*	引起；引爆（trigger 的过去分词）
	adj.	触发的；起动的
combined[kəmˈbaind]	*adj.*	联合的；合并的；合作完成的；协同做成的
accuracy[ˈækjurəsi]	*n.*	准确（性），准确度，精确（性），精密（性），精（密）度

【Notes to Text A】


【对应翻译】

[1] It includes the movement and storage of raw materials, work-in-process inventory, and finished goods from point of origin to point of consumption.

“work-in-process”意为“半成品”，其同义词有“semi-finished goods”“half finished product”。

[2] Interconnected or interlinked networks, channels and node businesses are involved in the provision of products and services required by end customers in a supply chain.

be involved in　包括……中，被卷入……中；涉及……

be required by　被……要求。例如：be required by circumstances　势在必行

[3] Supply chain management has been defined as the “design, planning, execution, control, and monitoring of supply chain activities with the objective of creating net value, building a competitive infrastructure, leveraging worldwide logistics,

synchronizing supply with demand and measuring performance globally. ”

with the objective of　以……为目标，在……目标下

[4] A simple supply chain is made up of several elements that are linked by the movement of products along it.

be made up of　由……所组成

【Exercises to Text A】

Ⅰ. Fill in the blanks.

【参考答案】

1. A simple supply chain is made up of several elements that are linked by the movement of products along it. It may include ______________________________.

2. Design, planning, execution, control, and ____________ of supply chain activities with the objective of creating net value, ____________ a competitive infrastructure, ____________ worldwide logistics, ____________ supply with demand and measuring performance globally.

Ⅱ. Translation.

1. 供应链以客户开始并以客户结束。

2. 当成品到达仓库，配送部门决定运送产品的最有效的方法，以便能在指定的日期或之前交付客户。



Text B　9 Tips for Managing a Global Supply Chain



【参考视频】

Your global supply chain should be short, simple, and **manageable**. Whether **sourcing** a component part used in the production of a product or finished goods, treat the chain as a strategic asset—one that, handled **deftly**, can provide a competitive advantage.

It is worth mentioning that many large companies use software programs for managing the export supply chain process, for purposes including item classification, order taking, **compliance** with export regulations, and generation of export **documentation**.

The use of export software enables companies to manage the supply chain with greater ease and efficiency. Conducting an Internet search for third-party

vendors using “export supply chain management software” or similar search terms will generate a number of specialized companies who offer sourcing, transportation, and fulfillment services. Due to the **complexity** in nature and the costs associated with export software management, most small businesses tend to manage their supply chain by working closely with logistics experts that offer you approved vendors who integrate their technology into your business applications and software solutions. These companies include UPS, FedEx, and DHL; UPS will custom fit a solution based on your supply chain needs.



Here are nine tips to assist you in managing a global supply chain:

(1) Source products from countries where regulations and **restrictions** are **minimal**. You want the ability to transport materials in and out of a country fast.

(2) Focus on minimizing costs but not to the **detriment** of **sacrificing** quality.

(3) Make sure that in performance-based contracts the supplier has a stake in where the product is sold. That way, you share risks and rewards.

(4) Establish a secondary source of supply to ensure that your primary source can be replaced easily. The performance of a primary supplier can quickly go south. Perhaps the company runs into financial problems, produces shoddy products, or falls short on delivery times. Should this occur, you will need a backup supplier.

(5) Tailor the locations of the supply chain directly to those of your customers, wherever they are.

(6) Test the reliability of the supplier. When you order, how long does it take for the company to respond and deliver? Does it invoice you accurately?

(7) Know where all your materials are coming in and out of and what the costs are to move them to any point.

(8) Retain as much control as you can over the entire supply chain process.

(9) Conduct regular **assessments** of every supplier contracted to manufacture your products in order to ensure they are meeting labor, health, safety, and environmental requirements.

【Key Words】

manageable [ˈmænidʒəb(ə)l]	*adj.*	易管理的；易控制的；易办的
sourcing [ˈsɔːsiŋ]	*v.*	发起；向……提供消息（source 的 ing 形式）
deftly [ˈdeftli]	*adv.*	熟练地；灵巧地；敏捷地
compliance [kəmˈplaiəns]	*n.*	顺从，服从；承诺
documentation [ˌdɔkjumenˈteiʃ(ə)n]	*n.*	文件，证明文件
complexity [kəmˈpleksəti]	*n.*	复杂，复杂性；错综复杂的事物
restriction [riˈstrikʃ(ə)n]	*n.*	限制；约束；束缚
minimal [ˈminim(ə)l]	*adj.*	最低的；最小限度的
detriment [ˈdetrim(ə)nt]	*n.*	损害；伤害
sacrificing [ˈsækrifaisiŋ]		亏本出售（sacrifice 的现在分词）
assessment [əˈsesmənt]	*n.*	评定；估价


【对应翻译】

【Notes to Text B】

Here are nine tips to assist you in managing a global supply chain:

assist …in… 帮助，帮助……做某事；协助，援助。例如：assist people in distress 济危扶困


【参考答案】

【Exercises to Text B】

Translation.

1. It is worth mentioning that many large companies use software programs for managing the export supply chain process, for purposes including item classification, order taking, compliance with export regulations, and generation of export documentation.

2. Conducting an Internet search for third-party vendors using "export supply chain management software" or similar search terms will generate a number of specialized companies who offer sourcing, transportation, and fulfillment services.



Reading Material

Developments in Supply Chain Management

Six major movements can be observed in the evolution of supply chain management studies: Creation, Integration, Globalization, Specialization Phases One and Two, and SCM 2.0.

1. Creation Era



The term "supply chain management" was first coined by an American industry consultant in the early 1980s. However the concept of supply chain in management, was of great importance long before in the early 20th century, especially by the creation of the assembly line. The characteristics of this era of supply chain management include the need for large scale changes, re-engineering, downsizing driven by cost reduction programs, and widespread attention to the Japanese practice of management.

2. Integration Era

This era of supply chain management studies was highlighted with the development of Electronic Data Interchange (EDI) systems in the 1960s and developed through the 1990s by the introduction of Enterprise Resource Planning (ERP) systems.

This era has continued to develop into the 21st century with the expansion of internet-based collaborative systems. This era of supply chain evolution is characterized by both increasing value-added and cost reduction through integration.

3. Globalization Era

The third movement of supply chain management development, globalization era, can be characterized by the attention towards global systems of supplier relations and the expansion of supply chain over national boundaries and into other continents.

Although the use of global sources in the supply chain of organizations can be traced back to several decades ago (e.g. the oil industry), it was not until the late 1980s that a considerable number of organizations started to integrate global sources into their core business.

This era is characterized by the globalization of supply chain management in organizations with the goal of increasing competitive advantage, creating more value-added, and reducing costs through global sourcing.

4. Specialization Era—Phase One—Outsourced Manufacturing and Distribution

In the 1990s, industries began to focus on "core competencies" and adopted a specialization model. Companies abandoned vertical integration, sold off non-core operations, and outsourced those functions to other companies. This changed management requirements by extending the supply chain well beyond the four walls and distributing management across specialized supply chain partnerships.

5. Specialization Era—Phase Two—Supply Chain Management as a Service

Specialization within the supply chain began in the 1980s with the inception of transportation brokerages, warehouse management, and non-asset based carriers and has matured beyond transportation and logistics into aspects of supply planning, collaboration, execution and performance management.

Supply chain specialization enables companies to improve their overall competencies in the same way that outsourced manufacturing and distribution has done; it allows them to focus on their core competencies and assemble networks of best in class domain specific partners to contribute to the overall value chain itself—thus increasing overall performance and efficiency.

Outsourced technology hosting for supply chain solutions debuted in the late 1990s and has taken root in transportation and collaboration categories most dominantly. This has progressed from the Application Service Provider (ASP) model from approximately 1998 through 2003 to the On-Demand model from approximately 2003—2006 to the Software as a Service (SaaS) model we are currently focused on today.



6. SCM 2.0

Building off of globalization and specialization, SCM 2.0 has been coined to describe both the changes within the supply chain itself as well as the evolution of the processes, methods and tools that manage it in this new "era".

Web 2.0 is defined as a trend in the use of the World Wide Web that is meant to increase creativity, information sharing, and collaboration among users. At its core, the common attribute that Web 2.0 brings is it helps us **navigate** the vast amount of information available on the web to find what we are looking for. SCM 2.0 follows this notion into supply chain operations.

SCM 2.0 leverages proven solutions designed to rapidly deliver results with the agility to quickly manage future change for continuous flexibility, value and success.

【Key Words】

evolution [ˌivəˈluʃən]	*n.*	演变；进化论；进展
globalization [ˌgloballəˈzeʃn]	*n.*	全球化
specialization [ˌspɛʃəliˈzeʃən]	*n.*	专门化；特殊化；特化作用

consultant [kən'sʌltənt]	*n.*	顾问；咨询者；会诊医生
characteristics [ˌkærəktə'ristiks]	*n.*	特性，特征；特色（characteristic 的复数）；特质
re-engineering [ri'endʒiniəriŋ]	*n.*	企业再造；再造工程；重建
	v.	再设计；重新建造（reengineer 的 ing 形式）
downsizing ['daʊnˌsaiziŋ]	*n.*	精简，裁员；缩小规模
boundary ['baʊndri]	*n.*	边界，界线
outsource ['aʊtsɔrs]	*vt.*	把……外包
	vi.	外包
outsourced	*adj.*	外包的；
	v.	转包；外购原料（outsource 的过去分词）
approximately [ə'prɑksimətli]	*adv.*	大约，近似地；近于
navigate ['nævə'get]	*vt.*	驾驶，操纵；使通过；航行于
	vi.	航行，航空

【Questions】

1. What are the stages of the development of the supply chain?
2. How to understand the supply chain management 2.0?

参 考 译 文

第 2 章　供应链管理

案例分析

啤酒游戏与牛鞭效应

啤酒游戏最初是由麻省理工学院斯隆管理学院杰伊·弗莱斯特教授在 20 世纪 60 年代初发明的。这个模拟游戏可以用来证明信息共享、供应链中电子协作的优势，以及证明一些供应链管理的关键原则。

游戏开始之前，必须了解一些相关内容：

1. 角色

（1）在游戏中有 4 个角色：零售商、批发商、分销商和制造商。见图 2.1。

（2）每个角色代表不同的公司，他们在供应链中互为客户或供应商。

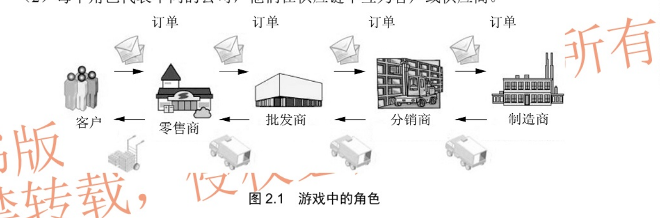


图 2.1　游戏中的角色

2. 规则

（1）游戏延续 1 年，涉及每一周，一共需要 52 轮。整个游戏进行中不能停歇。

（2）为了简便起见，每个角色只出售一种产品：情人的啤酒。单位是箱。

（3）游戏中有 3 种费用：库存成本= 1 美元/箱/周；积压成本=2 美元/箱/周；总成本=4 个阶段全部费用的总和。

（4）目标是最大限度地减少整个供应链成本！你需要做所有计算，并决定每周你需要下的订单数量。

（5）补给订单达到需要两周；装运时间也是两周。

（6）所有的要求都必须满足！如果由于某种原因你不能运送产品，产品将标注为“积压”，并且当存货中再出现该产品的时候就必须运送这个订单。

（7）**成员在任何阶段都不可以相互交流！**零售商绝不可以透露实际的客户订单！

（8）参与者们不能交换任何订单以外的信息。

3. 游戏程序

每一轮中，以下情况都会发生（见图 2.2）：

（1）从供应商处接收货物。

（2）从客户处接受订单。

（3）按照订单向客户运送货物。

（4）订购新的产品。

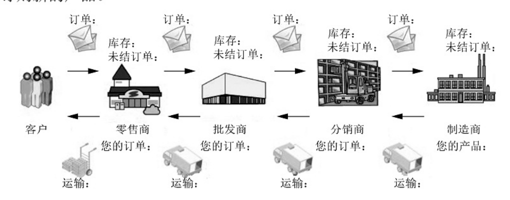


图 2.2　游戏过程

4. 图表（见图 2.3）

啤酒游戏~零售商~第　周

订单：　库存：　未结订单：　订单：

零售商

运输：　您的订单：　运输：

（1）零售商（仅限零售商使用）

啤酒游戏~批发商~第　周

订单：　库存：　未结订单：　订单：

批发商

运输：　您的订单：　运输：

（2）批发商（仅限批发商使用）

啤酒游戏~分销商~第　周

订单：　库存：　未结订单：　订单：

分销商

运输：　您的订单：　运输：

（3）分销商卡（仅限分销商使用）

啤酒游戏~制造商~第　周

订单：　库存：　未结订单：

产出：

制造商

运输：　您的产品：

（4）制造商卡（仅限制造商使用）

啤酒游戏~　　~第　周

订单：

（5）订单（任何角色均可使用）

啤酒游戏~　　~第　周

运输：

（6）运输（任何角色均可使用）

图 2.3　具体图表



（7）订单图表（任何角色均可使用）

啤酒游戏~库存

（8）库存图表（任何角色均可使用）



（9）费用图表（任何角色均可使用）

游戏总费用~团队：

角色位置	费用	排序
零售商		
批发商		
分销商		
工厂		
总计		

（10）团队费用（任何团队均可使用）

图 2.3 具体图表（续）

5. 游戏开始

（1）几组游戏可以同时开始，几个团队可以在同一时间相互对阵。

（2）教师在游戏中起着领导作用，在开始的 4 周，每周向零售商订购 4 箱啤酒。从第 4 周后，教师可以订购任意数量的啤酒。

（3）游戏将持续 52 周，但教师可以在任何时间宣布结束游戏。

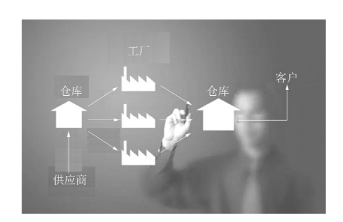
现在，教师宣布开始！

Text A

供应链管理概述

供应链管理（SCM）是对商品和服务的流动的管理。它包括原材料、在制品存货和成品从起始点到消费端的流动和存储。相互关联或相互连接的网络、渠道和节点企业都参与提供供应链终端客户所需的产品和服务中。

供应链管理被定义为“在以创造净值、构建有竞争力的基础设施、利用全球物流、同步供应与需求及测量全局性能为目标下进行的包括设计、规划、执行、控制和监控等供应链活动。



一个简单的供应链是由与产品的流动相连接的几个元素构成的。

（1）客户：供应链以客户开始并以客户结束。供应链中开始于客户决定采购一件已被一家公司提供销售的产品。客户联系公司的销售部门，要求特定数量并在一个特定日期交付的销售订单。如果产品完成生产，销售订单将包括一个必须满足的生产设备需要。

（2）计划：由客户订单触发的需求将会与其他订单结合。计划部门将建立一个生产计划来生产满足客户订单要求的产品。为了制造产品，公司将会采购所需的原材料。

（3）采购：采购部门收到一份由生产部门提供的，为满足消费者订单的原材料和服务需求列表。采购部门将采购订单发送给选择好的供应商，以便在规定的日期内将必要的原材料提供给制造部门。



（4）库存：来自供应商的原材料，经过质量和精确度的检测后，被运送到仓库。供应商将发票送达所交付原材料的公司。原材料被妥善存储，直到进入生产部门。

（5）生产：基于生产计划，原材料从库存转移到生产区。客户订单要求的成品是用从供应商处采购的原材料制造而成。在产品完成和测试后，它们被存储在仓库，运给客户之前。

（6）交通：当成品到达仓库，配送部门决定运送产品的最有效的方法，以便能在指定的日期或之前交付客户。当客户收到货物，公司将提供被运送产品的发票。

Text B

管理全球供应链的 9 个建议

你的全球供应链应该是简短的、简单的和可管理的。是否采购用于生产产品或成品的组件，将供应链作为战略资产——巧妙地处理，可以提供竞争优势。

值得一提的是，许多大公司使用软件程序来管理出口供应链过程，以达到包括项目分类、订单获取、出口条例遵循及编制出口商品文档这些目的。

出口软件的使用使公司更加轻松和有效地管理供应链。通过使用“出口供应链管理软件”或是相似软件对第三方供应商进行网络搜索，将会生成许多提供采购、运输和专递服务的专业公司。由于本身的复杂性和出口软件管理与成本相关，大部分小公司趋向于通过与物流专家密切合作来管理其供应量，这些物流专家提供被认可的供应商，这些供应商将他们的技术与你的商业应用和软件解决相整合。这些公司包括 UPS、FedEx 和 DHL；UPS 将会基于您的供应链需求定制解决方案。

以下是 9 个小建议，对你管理一个全球供应链将有所帮助：

（1）源产品应来自那些规定和限制最小的国家。你想要的是在一个国家内外材料运输能力最快。

（2）专注于降低成本，但不牺牲质量。

（3）确保在以绩效为基础的合同中，当产品售出后，供应商将会有奖金。这样，你将分享风险和回报。

（4）建立一个二级供应来源，以确保你的主要来源可以容易被取代。主要供应商的表现会迅速下降。也许公司遇到财务问题，生产劣质产品，或在交货时间不足。如果这些发生，你需要一个备用供应商。

（5）无论客户在哪里，调整供应链的位置，直接面对客户。

（6）测试供应商的可靠性。当你下订单时，供应商需要多长时间做出回应并交货？给予你的票据是否准确？

（7）知道你所有材料的进出及向任何地点运送这些材料的成本。

（8）在整个供应链过程保持尽可能多的控制。

（9）对每个承包生产你的产品的供应商进行定期的评估，以确保它们满足劳动者、健康、安全和环境要求。

阅读材料

供应链管理的发展

研究供应链管理的演变，可以发现有六大演变：创造、集成、全球化、专业化第一阶段和第二阶段及供应链管理 2.0 版本时代。

1．创造时代

“供应链管理”这个词最早是由美国产业顾问在 20 世纪 80 年代初期提出的。但是供应链管理的这一概念，早在 20 世纪初就非常重要，特别是组装线开始出现时。那时的供应链管理的特点包括大规模变化需要、重组、降低成本计划推动的减员，还有对日本管理实践的广泛关注。

2．集成时代

这个时代供应链管理强调电子数据（EDI）交换系统的发展，它从 20 世纪 60 年代开始，在 90 年代通过引进企业资源规划系统得到发展。

进入 21 世纪，通过以因特网为基础的协作系统的扩大，这个时代继续发展。这个时代的供应链演变的特点是通过一体化提高附加值，降低成本。

3．全球化时代

供应链管理发展的第三个阶段就是全球化时代，其特点为关注于供应商关系的全球系统和跨国界、跨区域的供应链扩大。

尽管在供应链组织中使用全球资源可以追溯到几十年前（如石油行业），但直到 20 世纪 80 年代末，才有相当多的组织开始将全球资源纳入其核心业务。

这个时代的特点是组织供应链管理的全球化，其目的是增加竞争优势，创造更多附加值，同时通过全球采购降低成本。

4．专业化时代——第一阶段——外包生产和销售

在 20 世纪 90 年代，行业开始关注“核心竞争力”，并通过了一项专业化模式。公司放弃了纵向一体化，出售非核心业务，外包这些职能给其他公司。通过进一步扩大供应链和专业供应链合作伙伴关系的分销管理改变了管理要求。

5．专业化时代——第二阶段——供应链管理作为一种服务

20 世纪 80 年代，伴随着运输券商、仓库管理、非资产基础运营商的出现，以及在供应规划、协作、执行和绩效管理的各方面中已经成熟的运输和物流，专业化的供应链开始了。

供应链的专业化使公司能够提高它们的整体能力，外包生产和销售同样可以提高公司的整体能力；它使公司的核心竞争力和组装网络成为最佳的区域合作伙伴，促进整个价值链本身，从而提高整体性能和效率。

供应链解决方案主办的外包技术在 20 世纪 90 年代后期推出，那时候就主要植根于运输和协作。这在应用服务提供商模式中已取得进展，从 1998—2003 年以按需模型，从 2003—2006 年以软件作为服务模式，这一模式正是目前我们所关注的。

6．供应链管理 2.0 版本

为构建全球化和专业化，供应链管理 2.0 已经被用来形容供应链本身的变化及在这个新的“时代”管理它的过程、方法和工具的演变。

Web 2.0 是使用万维网的一种趋势，即意味着增加创造力，信息共享和用户之间的协作。其核心，Web 2.0 带来的共同属性（即核心）是它将帮助我们可以在网上浏览大量的信息，找到我们所寻找的。供应链管理 2.0 将这一概念纳入供应链的运作。

供应链管理 2.0 利用经过验证的解决方案快速提供结果，旨在持续灵活地、有价值地、成功地快速管理未来的变化。



Chapter 3

Transport Management



Case Study

The Snakes and Ladders Game

The Snakes and **Ladders** Game is a classic **board** game which students can use a **dice** to move counters up ladders and down snakes. At the beginning, teacher may divide students into some groups and let each group play this game according to the game rules. The game aims to help students with recalling, **associating**, **distinguishing**, resolving, remembering information and knowledge of transportation facility and modes.

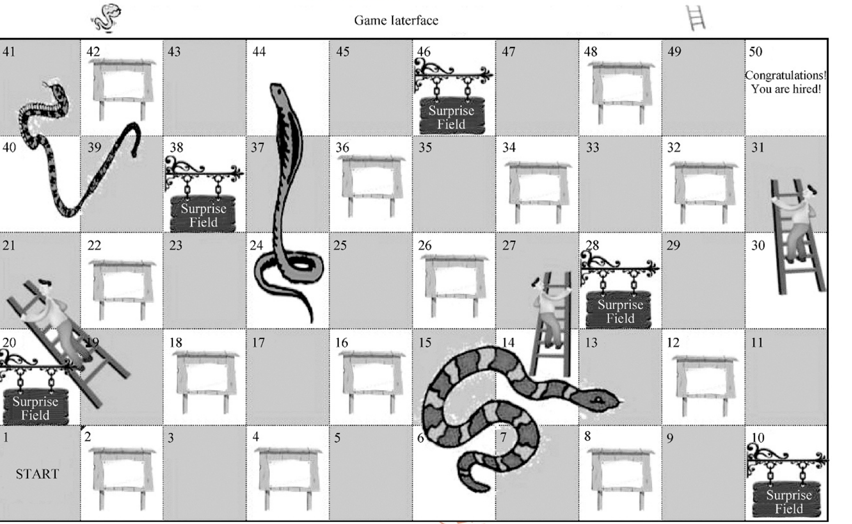


The Snakes and Ladders Game in Transportation Lesson

(*Produced by Cong Qian, NJCC*)

Game Rules	
1	The game can be played by 4 or more players, simulate the process of passing an interview.
2	Each player chooses a marker of a different color and places it on the START square.
3	Each player rolls a dice and reads the number that he or she rolls.
4	If a player lands on a question square, they must answer the question. Answers will be judged by other players to be a good idea (correct) or a bad idea (incorrect). If other members of the group disagree, the player must go back to the last square.
5	If the player lands at the bottom of a ladder, he or she **climbs up**.
6	If the player lands on a snake's head, he or she **slides down**.
7	If the player lands on a surprise square, he or she chooses a card from the surprise pile and does as it says. If the player refuses to follow the instructions on the surprise card, he or she must lose a turn.
8	The winner is the one who first reaches No.50.

Game Iaterface



Interview Questions			
Can you tell us what are the first forms of transport?	Which kind material was the first watercraft made of, wood or metal?	Interviewers want you to explain 2 examples of fixed installations, such as railway stations etc. .	What's the difference between airport and aircraft?
Interviewers want you to list four kinds of vehicles, such as bus etc..	Can you tell us some modes of transportation, such as railway?	In your opinion, what's the differences between rail transport and road transport?	In your opinion, what's the differences between rail transport and water transport?
In your opinion, what's the differences between rail transport and road transport?	In your opinion, what's the differences between air transport and road transport?	In your opinion, what's the differences between rail transport and air transport?	Have you ever heard of pipeline transport? Please give us an example.
Would you please tell us strengths and weaknesses of rail transport?	Would you please tell us strengths and weaknesses of air transport?	Would you please tell us strengths and weaknesses of water transport?	Would you please tell us strengths and weaknesses of road transport?
Surprise Card			
Surprise Card Please move three steps forward for your excellent performance.	Surprise Card Please move two steps forward for your good performance.	Surprise Card Enter the last round of the interview, go to No.42.	Surprise Card Please move two steps back for your mistakes in the interview.
Surprise Card Failed to pass the written examination, please wait for next chance.	Surprise Card Please move three steps back for your mistakes in the interview.	Surprise Card	Surprise Card

【Key Words】

ladder[ˈlædə(r)] *n.* 阶梯；途径；梯状物

board game 棋盘游戏

dice[dais] *n.* 骰子

associating[əˈsoʃiˌet] *v.* 结合；使联合；把……联系在一起（associate 的 ing 形式）

distinguishing[diˈstiŋgwiʃiŋ] *adj.* 有区别的

v. 区别；表现突出（distinguish 的 ing 形式）

climb up　　　　向上爬；攀登
slide down　　　　滑下，往下滑；塌陷



Text A History of Transport

【参考视频】

Transport or transportation is the movement of people and goods from one location to another. Humans' first means of transport were walking and swimming.

The first forms of road transport were horses, **oxen** or even humans carrying goods over **dirt tracks** that often followed game trails.[1] **Paved** roads were first built by the Roman Empire, to allow armies to travel quickly. The first watercraft was canoes cut out from tree **trunks**. Early water transport was accomplished with ships that were either rowed or used the wind for **propulsion**, or a combination of the two. Until the **Industrial Revolution**, transport remained slow and costly.



The Industrial Revolution in the 19th century saw a number of inventions fundamentally change transport. The invention of the steam engine, closely followed by its application in rail transport, made land transport independent of human or animal muscles.

The development of the combustion engine and the automobile at the turn into the 20th century, road transport became more **viable**, allowing the introduction of mechanical private transport.[2] The first highways were constructed during the 19th century with **macadam**. Later, **tarmac** and **concrete** became the **dominant** paving material. In 1903, the first controllable airplane was invented, and after World War Ⅰ, it became a fast way to transport people and express goods over long distances.

After World War Ⅱ, the automobile and airlines took higher shares of transport, reducing rail and water to freight and short-haul passenger.

Spaceflight was launched in the 1950s, with rapid growth until the 1970s, when interest **dwindled**. In the 1950s, the introduction of containerization gave massive efficiency gains in freight transport, permitting globalization. International air travel became much more accessible in the 1960s, with the **commercialization** of the jet engine. Along with the growth in automobiles and motorways, this introduced a decline for rail and water transport. After the introduction of the Shinkansen in 1964, high-speed rail in Asia and Europe started taking passengers on long-haul routes from airlines.

【Key Words】

oxen [ˈɔksn]	*n.*	牛，公牛（ox 的复数）
dirt track		泥铺道路
pave [peiv]	*vt.*	铺；为……铺平道路
trunk [trʌŋk]	*n.*	树干
propulsion [prəˈpʌlʃən]	*n.*	推进
Industrial Revolution	*n.*	工业革命
viable [ˈvaiəbl]	*adj.*	切实可行的；可实施的
macadam [məˈkædəm]	*n.*	铺路用的碎石料；柏油碎石路
tarmac [ˈtɑːmæk]		碎石和沥青的混合材料；沥青碎石路面
	vt.	以碎石沥青铺盖（某物）表面
concrete [ˈkɔnkriːt]	*adj.*	实体的，有形的；确实的，明确的，确定的
dominant [ˈdɔminənt]	*adj.*	占优势的；统治的，支配的；突出的
dwindled [ˈdwindld]	*vi.*	逐渐变少或变小（dwindle 的过去式）
commercialization [kəˌməːʃəlaiˈzeiʃən]	*n.*	商业化，商品化

【Notes to Text A】


【对应翻译】

[1] The first forms of road transport were horses, oxen or even humans carrying goods over dirt tracks that often followed game trails.

“dirt tracks”是“dirt track”的复数形式，意为“泥铺道路”。

“game”意为“猎物的，野味的，野兽的；与狩猎有关的”。

[2] The development of the combustion engine and the automobile at the turn into the 20th century, road transport became more viable, allowing the introduction of mechanical private transport.

“turn into”意为“进入，走进”。



【Exercises to Text A】

Fill in the blanks.

Period or Item	Example	Example
Humans' first means of transport		
The first forms of road transport		
The first watercraft		
The steam engine era		
The combustion engine era		



Text B Transportation Elements

Transportation elements include **infrastructure**, **vehicles**, and operations.

1. Infrastructure

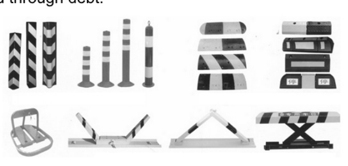
Infrastructure is the fixed installations that allow a vehicle to operate. It consists of the fixed installations necessary for transport, and may be roads, railways, airways, waterways, canals and pipelines, and **terminals** such as airports, railway stations, bus stations, warehouses, trucking terminals, **refueling depots** (including fueling docks and fuel stations), and seaports. [1]

Infrastructure consists of both a way, terminal and facilities for parking and maintenance. For rail, pipeline, road and cable transport, the entire way the vehicle travels must be built up. Aircraft and watercraft are able to avoid this, since the airway and seaway do not need to be built up. However, they require fixed infrastructure at terminals.



Terminals such as airports, ports and stations, are locations where passengers and freight can be transferred from one mode to another. For passenger transport, terminals are integrating different modes to allow riders to **interchange** to take advantage of each mode's advantages. For freight, terminals act as **transshipment** points, though some cargo is transported directly from the point of production to the point of use.

The financing of infrastructure can either be public or private. Transport is often a natural **monopoly** and a necessity for the public; roads, and in some countries railways and airports are funded through taxation. New infrastructure projects can involve large spending, and are often financed through debt.





2. Vehicle

A vehicle is any non-living device that is used to move people and goods. Unlike the infrastructure, the vehicle moves along with the cargo and riders. Vehicles may include automobiles, bicycles, buses, trains, trucks, people, **helicopters**, and aircraft.

Vehicles that do not operate on land, are usually called crafts. Unless being pulled by a cable or muscle-power, the vehicle must provide its own propulsion; this is most commonly done through a steam engine, **combustion** engine, electric motor, a jet engine or a rocket, though other means of propulsion also exist. [2] Vehicles also need a system of **converting** the energy into movement; this is most commonly done through wheels, **propellers** and pressure.

Vehicles are most commonly staffed by a driver. However, some systems, such as people movers and some rapid transits, are fully automated. For passenger transport, the vehicle must have a compartment for the passengers. Simple vehicles, such as automobiles, bicycles or simple aircraft, may have one of the passengers as a driver.





【参考视频】

3. Operation

For public transport and freight transport, operations are done through private enterprise or by governments. The infrastructure and vehicles may be owned and operated by the same company, or they may be operated by different entities. Traditionally, many countries have had a national airline and national railway. Since the 1980s, many of these have been privatized. International shipping remains a highly competitive industry with little **regulation**, but ports can be public owned.

【Key Words】

infrastructure [ˈinfrəˌstrʌktʃə]	*n.*	基础设施；基础结构
vehicle [ˈviːikl]	*n.*	交通工具，车辆
terminal [ˈtəːminl]	*n.*	终端，终点；极限；终点站，总站，航空集散站；卸货码头，转运基地
refueling depot		加油站
interchange [ˌintəˈtʃeindʒ]	*vt.*	交换事物，互换；使两人或两物相互易位
	vt. & vi.	交替变化
transshipment [trænsˈʃipmənt]	*n.*	转运
monopoly [məˈnɔpəli]	*n.*	垄断
helicopter [ˈhelikɔptə]	*n.*	直升机
combustion [kəmˈbʌstʃən]	*n.*	燃烧
convert [kənˈvəːt]	*vt. & vi.*	（使）转变，（使）转化；改变（信仰）
propeller [prəˈpelə]	*n.*	螺旋桨，推进器
regulation [ˌregjuˈleiʃən]	*n.*	管理，控制；规章；规则

【Notes to Text B】


【对应翻译】

[1] It consists of the fixed installations necessary for transport, and may be roads, railways, airways, waterways, canals and pipelines, and terminals such as airports, railway stations, bus stations, warehouses, trucking terminals, refueling depots (including fueling docks and fuel stations), and seaports.

fixed installations　固定装置

trucking terminals　卡车货运站

[2] Unless being pulled by a cable or muscle-power, the vehicle must provide its own propulsion; this is most commonly done through a steam engine, combustion engine, electric motor, a jet engine or a rocket, though other means of propulsion also exist.

“muscle-power”意为“力量牵引”。

“means of”在本句中意为“工具”，例如：

The train is a safe means of transportation. 火车是一种安全可靠的交通工具。


【参考答案】

【Exercises to Text B】

Fill in the blanks.

Infrastructure	Vehicle	
Airport		Helicopter
	Bullet Train	Train
	Barge	
	Bus	Truck



Text C　Transportation Mode


【参考视频】

Transport is performed by modes, such as rail, road, water, air, pipeline, **cable** and space. Each mode has its advantages and disadvantages, and will be chosen for a trip on the basis of cost, capability, route, and speed.

In this text, we will look at five modes separately, emphasizing the factors which give one mode advantages over others, or which put that mode at a disadvantage.





1. Rail transport

Rail transport is where a train runs along a set of two **parallel** steel rails, known as a railway or railroad. The **locomotive** can be powered by steam, diesel or by electricity supplied by **trackside** systems. Rail network is used for moving large volumes of freight over long distances. Regional and **commuter** trains feed cities from suburbs and surrounding areas, while intra-urban transport is performed by high-capacity tramways and rapid **transits**, often making up the backbone of a city's public transport.[1] Freight trains traditionally

used box cars, requiring **manual** loading and unloading of the cargo.

Strengths:

(1) Rail transport offers cost advantages for high volume or long distance hauls.

(2) High average speeds for journeys in the arrange of 50 to 300 miles, which is especially important for passengers.

(3) The safety record of the railway is excellent with both passengers and freight. This is especially true with the carriage of hazardous cargo.

(4) Of all the land-based modes, the railways are least affected by bad weather.

Weaknesses:

One of the major weaknesses of railway is the inherent inflexibility of operation, fixed (non-flexible) time schedules and service from terminal to terminal rather than from stocking location to stocking location. It is almost impossible for the railways to adapt their infrastructure to meet the challenges of the changing patterns of economic and social activities.

2. Road transport

A road is an **identifiable** route, way or path between two or more places. The most common road vehicle is the automobile; a wheeled passenger vehicle that carries its own motor. Other users of roads include buses, trucks, motorcycles, bicycles and **pedestrians.**

Strengths:

(1) The advantages of motor transport are flexibility of location, time and speed of delivery.

(2) Buses allow for more efficient travel at the cost of reduced flexibility.

(3) Road transport by truck is often the initial and final stage of freight transport.

Weaknesses:

(1) The size of the load is restricted by legislation with limits on vehicle size and weights, not by the prevailing technology and economies as with other modes.

(2) Roads are not used exclusively by one form of transport and **congestion** can occur which interferes with schedule planning and time keeping.

(3) Automobiles are deemed with high energy and area use, and the main source of noise and air pollution in cities.

3. Water transport

Water transport is the process of transport a watercraft, such as a barge, boat, ship or sailboat, makes over a body of water, such as a sea, ocean, lake, canal or river. [2] Water transport is utilized for large loads of low-value-per-unit goods. In the 1800s the first steam ships were developed, using a steam engine to drive a **paddle** wheel or **propeller** to move the ship. The steam was produced using wood or coal. Now most ships have an engine using a slightly refined type of petroleum called bunker fuel. Some specialized ships, such as **submarines**, use nuclear power to produce the steam.

Strengths:

(1) Modern sea transport is a highly effective method of transporting large quantities of **non-perishable** goods.

(2) For the users, this is the cheapest method of moving goods worldwide. Transport by water is significantly less costly than air transport for trans-continental shipping.

Weaknesses:

(1) The main **drawback** is the speed of the ship which is very slow especially when it is realized that the ship operates continuously without a break.

(2) Although ships are relatively safe, accidents can involve severe pollution and sometimes loss of life.

4. Air transport

The aircraft is the second fastest method of transport, after the rocket. During the flight, the crew of an aircraft has to communicate with stations on the ground to give details of the position, receive information and instructions as to the position of other aircraft.

Strengths:

(1) The major strength of air transport is the speed of travel. The longer the distance of the flight, the greater the time saving of the customer.

(2) Short distances or in inaccessible places helicopters can be used.

(3) Air transport has a good public image and is perceived to be very **glamorous**.

Weaknesses:

(1) Inflexible in that an airplane has to land and take off at an airport, which is sited far away from the city centers.

(2) For freight, in comparison to sea transport, air transport is expensive for the shipper and the cargo carrying capacity is small. [3]

(3) High costs and energy use.

(4) The weather conditions is very important.

5. Pipeline transport

Pipeline transport sends goods through a pipe; most commonly liquid and gases are sent. Any chemically stable liquid or gas can be sent through a pipeline. Short-distance systems exist for **sewage**, slurry, water and beer, while long-distance networks are used for **petroleum** and natural gas. [4]

Strengths:

(1) Pipelines are in the main environmentally sound as they can easily be buried, can traverse difficult **topography** and laid under water. They do not give off **fumes** or make a lot of noises, and can be **disguised** against visual **intrusion.**

(2) Another advantage is that they are largely automated with very few personnel needed to control the pumps and valves or to undertake maintenance.

Weaknesses:

(1) Costs of transport rise rapidly per unit handled as actual usage falls from the optimum because of the high proportion of fixed cost in the total cost of operation.

(2) They are inflexible geographically in that they are designed to serve fixed locations and there is a finite capacity which cannot be altered to accommodate sudden surges in demand.

【Key Words】

cable [ˈkeibl] *n.* （船只、桥梁等上的）缆绳，钢索；电缆
parallel [ˈpærəlel] *adj.* 平行的；类似的；相对应的
n. 平行线
locomotive [ˈləukəˌməutiv] *n.* 火车头，机车
adj. 移动的，有移动力的，产生运动的
trackside [ˈtræksaid] *n.* 轨道旁，线路旁
commuter [kəˈmju:tə] *n.* 上下班往返的人
transit [ˈtrænsit] *n.* 搬运；载运；运输
manual [ˈmænjuəl] *adj.* 用手的，手工的
n. 手册，指南
identifiable [aiˈdentifaiəbl] *adj.* 可以确认的
pedestrian [piˈdestriən] *n.* 步行者
congestion [kənˈdʒestʃən] *n.* 拥挤；堵车；充血；阻塞
paddle [ˈpædl] *n.* 桨；桨状物；划船，荡桨
vi. 用桨划，划小船；涉水，玩水
propeller [prəˈpelə] *n.* 螺旋桨，推进器
submarine [ˈsʌbməri:n] *n.* 潜艇
non-perishable [nɒnˈperiʃəbl] *n.* 不易损坏之物
adj. 不易坏的
drawback [ˈdrɔ:bæk] *n.* 缺点，不利条件；障碍
glamorous [ˈglæmərəs] *adj.* 富有魅力的，迷人的
sewage [ˈsjuidʒ] *n.* （下水道里的）污物
petroleum [piˈtrəuliəm] *n.* 石油
topography [təˈpɒgrəfi] *n.* 地形学，地形测量学；地形，地貌
fume [fju:m] *n.* 烟雾，气味
disguise [disˈgaiz] *vt.* 假扮，化装；伪装；掩盖，掩饰
n. 伪装；伪装品
intrusion [inˈtru:ʒən] *n.* 闯入；打扰；干扰，干涉

【Notes to Text C】


【对应翻译】

[1] Regional and commuter trains feed cities from suburbs and surrounding areas, while intra-urban transport is performed by high-capacity tramways and rapid transits, often making up the backbone of a city's public transport.

tramways 有轨电车

rapid transits 高速铁路交通；快轨

[2] Water transport is the process of transport a watercraft, such as a barge, boat, ship or sailboat, makes over a body of water, such as a sea, ocean, lake, canal or river.

“process of”在本句中意为“……的过程”，例如：

Growth is a process of trial, error, and experimentation. 成长是一个考验、错误和实践的过程。

“make over”在本句中意为“航行在……之上”。

[3] For freight, in comparison to sea transport, air transport is expensive for the shipper and the cargo carrying capacity is small.

in comparison to　与……相比；同……比较起来

carrying capacity　承载能力；载运容量

[4] Short-distance systems exist for sewage, slurry, water and beer, while long-distance networks are used for petroleum and natural gas.

be used for　用于；被用于做某事

【Exercises to Text C】

【参考答案】

Ⅰ. Connection Work.

Natural gas		
Canal	**Rail transport**	Airport
Barge		
Aircraft	**Road transport**	Pumps and valves
Helicopter		
Commuter train	**Water transport**	Railway station
Truck		
Bus	**Air transport**	Seaport
slurry		
Automobile	**Pipeline transport**	Station
Train		

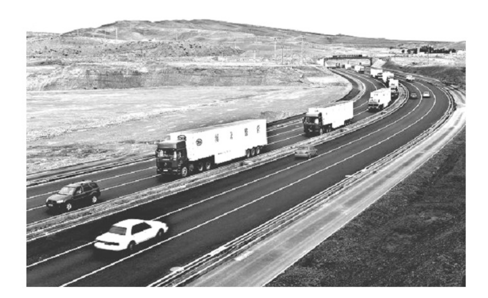
Ⅱ. Play the Snakes and Ladders Game again and try to find the fastest winner.



Reading Material

Transportation Service Characteristics—Motor Transportation

Customer service is a vital component of logistics management. Each activity of logistics management contributes to the level of service a company provides to its customers, although transportation's impact on customer service is one of the most significant. The most important transportation service characteristics affecting customer service levels are: dependability (consistency of service); time-in-transit; market coverage (the ability to provide door-to-door service); flexibility (with respect to the variety of products that can be handled and meeting the special needs of shippers) ; loss and damage performance; and the ability of the carrier to provide more than just basic transportation service (e.g., to become part of a shipper's overall marketing program).



During the late 1960s, motor carriage replaced rail carriage as the dominant form of freight transport in the United States. Motor carriers transport over 75 percent of the tonnage of agricultural products such as fresh and frozen meats, dairy products, bakery products, confectionery items, beverages, and cigars. Many manufactured products are transported by motor carriers, including amusement, sporting, and athletic goods, toys, watches, clocks, farm machinery, radios, televisions, phonographs, records, carpets and rugs, clothing, drugs, and office and accounting machines. Most consumer goods are transported by motor carriers. Usually, motor carriers compete with air for small shipments and rail for large shipments.

An efficient motor carrier can compete with an air carrier on point-to-point service for any size shipment if the distance involved is 1,000 miles or less. This is so because motor carriers realize greater efficiencies in terminal.

Motor carriers are more flexible and versatile than other modes. The flexibility of motor carriers is made possible by a wide range network of roads, thus enabling them to offer point-to-point service between almost any origin-destination combinations. Motor carriers are versatile in that they can transport products of varying sizes and weights over any distance. Virtually, any product, some for which equipment modifications are necessary, can be transported by motor carriers. Their flexibility and versatility has enabled them to become the dominant form of transport in the United States and in many other parts of the world.

In general, motor carriage offers the customer fast, reliable service with little damage or loss in transit. Motor carriers give much faster service than railroads and compare favorably with air carriers on short hauls. Many motor carriers, particularly those involved in "just-in-time" programs, operate on a scheduled timetable. This results in very short and reliable transit times. Loss and damage ratios for motor carriers are substantially lower than for rail and are slightly higher than for air freight. No other mode can provide the market coverage offered by motor carriers.

The amount of freight transported by motor carriers has steadily increased over the years. That trend is likely to continue in the years ahead. As long as it is able to provide fast, efficient service at rates between those offered by rail and air, the motor carriage industry will continue to prosper.

【Key Words】

vital [ˈvaitl]	*adj.*	至关重要的；生死攸关的；有活力的
impact on		影响；对……冲击，碰撞
significant[sigˈnifikənt]	*adj.*	重大的；有效的；有意义的；值得注意的；意味深长的
	n.	象征；有意义的事物
dominant [’dɒminənt]	*n.*	显性
	adj.	显性的；占优势的；支配的，统治的
confectionery[kənˈfekʃ(ə)n(ə)ri]	*n.*	糕点糖果；糖果店
beverage[ˈbev(ə)ridʒ]	*n.*	饮料
cigar [siˈgɑː]	*n.*	雪茄
amusement [əˈmjuːzm(ə)nt]	*n.*	消遣，娱乐；乐趣
athletic[æθˈletik]	*adj.*	运动的，运动员的；体格健壮的
phonograph [ˈfəʊnəgrɑːf]	*n.*	留声机；电唱机
	vt.	用留声机灌音；用留声机放音
carpet[ˈkɑːpit]	*n.*	地毯；地毯状覆盖物
	vt.	在……上铺地毯，把地毯铺在……上
versatile [ˈvɜːsətail]	*adj.*	多才多艺的；通用的，万能的；多面手的
modification[ˈmɒdifiˈkeiʃ(ə)n]	*n.*	修改，修正；改变
prosper[ˈprɒspə]	*vi.*	繁荣，昌盛；成功
	vt.	使……成功；使……昌盛；使……繁荣

【Questions】

1. What are the most important transportation service characteristics affecting customer service levels?

2. What are the advantages of motor transportation?

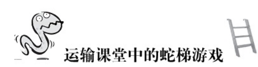
参考译文

第3章 运输管理

案例分析

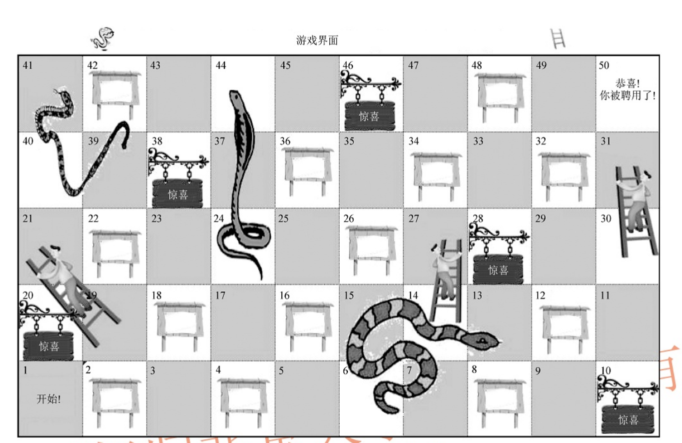
蛇梯游戏

蛇梯游戏是一个经典的棋盘类游戏，学生在游戏中可以通过掷出的骰子数来移动方格，在某一方格时或可爬梯上行或可顺蛇身下降。在本节课的开始，教师可将学生分为几组，让学生们按照游戏规则开始游戏。本游戏的目的是帮助学生回忆、联系、区分、解决、记忆与运输有关的知识和信息。



（本游戏由南京科技职业学院丛倩设计制作）

游戏规则	
1	游戏可以有4个或以上的参与者，模拟在一运输公司中面试的程序。
2	每个参与者可选择不同颜色的标记，并且把它们放在起始点上。
3	每个参与者通过掷出骰子的数字来移动各自的标识。
4	如果参与者移动到了问题方块，他们必须回答问题。答案由其他成员判断正确与否。如果其他成员不同意该答案则参与者只能回到原先的方块。
5	如果参与者移动到了梯子的底部，他（她）可以顺梯而上。
6	如果参与者移动到了蛇的头部，他（她）只能顺蛇身而下。
7	如果参与者移动到了惊喜方块，他（她）可以获得一张惊喜卡并要按照卡片的要求去做；如果参与者拒绝依照卡片要求，他（她）必须被停止一轮游戏。
8	胜利者为最先到达方块50者。



面 试 问 题

你能告诉我们人类最早的运输形式是什么样的吗？		你认为最原始的船只是有什么材料制成的？木头还是金属？		面试者希望你能举出两个例子说明运输固定设施，例如火车站。		机场和飞机有什么区别？
面试者希望你能列出一些交通工具，例如公共汽车。		你能告诉我们交通运输的一些模式吗？		在你看来，铁路运输和公路运输之间有什么区别？		在你看来，铁路运输和水路运输之间有什么区别？
在你看来，铁路运输和航空运输之间有什么区别？		在你看来，航空运输和公路运输之间有什么区别？		在你看来，水路运输和公路运输之间有什么区别？		你听说过管道运输吗？请举个例子。
你能告诉我们铁路运输的优、缺点吗？		你能告诉我们航空运输的优、缺点吗？		你能告诉我们水路运输的优、缺点吗？		你能告诉我们公路运输的优、缺点吗？

惊喜卡						
惊喜卡 由于你的出色表现可以向前推进三步。		惊喜卡 由于你的优秀表现可以向前推进二步。		惊喜卡 进入最后一轮面试，前进至方块 42。		惊喜卡 由于你在面试中发生了失误，先后退二步。
惊喜卡 没能通过笔试，请等待下次机会。		惊喜卡 由于你在面试中发生了失误，先后退三步。		惊喜卡		惊喜卡

Text A

运输的历史

运输就是把人和货物从一个位置移动到另一个位置。人类最初的运输手段是步行和游泳。

公路运输的最初形式是马、牛，甚至是人类带货走过的泥铺道路，这种道路通常沿循狩猎的踪迹。为了使军队可以快速行进，罗马帝国首次铺设了道路。最初的船舶是由被切断的树干制成的独木舟。早期的水上运输是船只前行或者是划动，或是风力推进，或两者兼而有之。直到工业革命前，运输仍然是缓慢而成本高昂的。

在 19 世纪工业革命中，我们可以看到一系列发明从根本上改变了运输。蒸汽机的发明，以及紧随其后的在铁路运输、陆路运输方面的应用，解放了人力或畜力。

进入 20 世纪之交，内燃机和机动车的发展，允许私人运输设备的引进，使公路运输变得更加可行。最早的高速公路是在 19 世纪建造的柏油碎石路。之后，沥青和混凝土成为主要的铺路材料。1903 年，第一架可操控飞机被发明，在第一次世界大战后，它成为一种人们交通和长途货运的快速方式。

第二次世界大战后，机动车和航空运输降低，而铁路和水路货运与短途客运在运输中占有了更高的份额。航天器在 20 世纪 50 年代出现，快速增长直至 20 世纪 70 年代，同时它的影响下降了。在 20 世纪 50 年代，集装箱货运的大规模引入提高了效率，提供了全球化。在 60 年代，随着商业化飞机的引入，国际航空旅行变得更容易。机动车和高速公路的增长导致铁路和水运的下降。在新干线于 1964 年出现之后，亚洲和欧洲的高速铁路开始接受远程航线的航空公司的乘客。

Text B

交 通 要 素

交通要素包括基础设施、交通工具和运营。

1．基础设施

基础设施是能使交通工具正常运行的固定装置。它包括必要的交通固定装置，可以是公路、铁路、航线、航道、运河和管道，以及诸如机场、火车站、公共汽车站、仓库、货运码头、加油站（包括加油码头和燃料站）和海港等站点。

基础设施既包括航道、码头及设施，又包括维修保养。对于铁路、管道、公路和电缆运

输来说，交通工具运行的全程路线都必须被建造。空运和水运则不会出现这种情况，因为航道和水道不需要建造。然而，需要在码头建造固定的基础设施。

如机场、港口和车站等码头站点是乘客和货物可以从一种运输工具或模式转换成另一种的场所。对于客运来说，码头整合不同的模式，让乘客在转乘时可以充分利用各种模式的优势。对货运来说，虽然有些货物从生产点直接向使用点运输，码头仍然扮演了转运点的角色。

基础设施的投资可以是公共的或私人的。运输往往被垄断，也属于公共必需品；道路，以及在一些国家的铁路和机场，是由国家税收投资建设的。新的基础设施项目可能涉及大项经费开支，也常常通过债务融资。

2．交通工具

交通工具是非生物设备，用于移动人员和货物。不同于基础设施，交通工具连同货物和乘客一起移动。交通工具可以包括机动车、自行车、公共汽车、火车、卡车、人员、直升机和飞机。

不在土地运营的交通工具通常被称为船或航天器。除非在电缆或力量的牵引下，融交通工具必须自行来推进；最常见的是通过蒸汽机、内燃机、电动机、喷气发动机或火箭来推进，但其他方式的推进也存在。交通工具还需要一种系统能够将能源转换成运动；最常见的是通过车轮、螺旋桨和压力。

交通工具普遍配备司机。然而，一些如人力推动和一些快速横越的系统则完全自动化。对于客运来说，交通工具必须拥有乘客车厢。简单的交通工具，如机动车、自行车或简易的飞行器等，可能让其中一名乘客做司机。

3．运营

对于公共运输和货物运输来说，运营管理都是通过民营企业或政府来进行的。基础设施和交通工具可能被同一家公司所拥有和运营，或者可能是由不同的实体来经营。传统上，许多国家已经拥有国营的航空公司和铁路。20 世纪 80 年代以来，其中许多已经被私有化。国际航运仍是一个管制较少而高度竞争的产业，但其港口可以公有。

Text C

运 输 模 式

运输表现为如铁路、公路、水运、航空、管道、电缆和空间等模式。每种模式都有其优点和缺点，并将基于其成本、能力、线路和速度来选择运送。

在本文中，我们将分别介绍 5 种模式，关注这些模式较其他而言的优势或劣势。

1．铁路运输

铁路运输是指一列火车沿着两条被称为铁轨的平行钢运行。火车头可以采用蒸汽动力、柴油动力或由轨道系统供应的电力来推进。铁路网络是用于移动长距离的大量货物。区域和市郊往返列车满足了从郊区或周边地区到城市的交通需求，而城市内的交通是由高容量轻轨和快速过境电车执行，它们构成了一个城市的公共交通运输的主干。货运列车传统上使用棚车，需要人工装卸货物。

优势：

（1）铁路运输提供了大量或长途运输的成本优势。

（2）运行中保持 50～300 英里/时的较高平均速度，这是对乘客来说是特别重要的。

（3）对于乘客和货物来说，铁路行车的安全记录很好，尤其对于运输危险货物也是如此。

（4）在所有的陆上运输模式中，铁路是受恶劣天气影响最小的。

劣势：

铁路的主要劣势之一就是其运营的固有僵化，固定（非弹性）的时间表，从站点到站点的服务而不是从存储地点到存储地点。对于铁路来说，要改变其基础设施以适应经济和社会活动模式变化的挑战，这几乎是不可能。

2．公路运输

公路是一种在两个或以上地点之间可以辨认的路线、道路或者路径。最常见的交通工具是机动车；具有发动机的轮式可乘坐交通工具。其他的道路使用者包括公共汽车、卡车、摩托车、自行车和行人。

优势：

（1）机动车运输的优点是在地点、交货时间和速度上的灵活性。

（2）公共汽车具有更有效运行和降低成本的灵活性。

（3）公路卡车运输往往是货运的最初和最后阶段。

劣势：

（1）负载的大小、车辆的尺寸和重量受法规严格限制，不像其他模式那样被普遍采用的技术和经济所限制。

（2）公路不被某一种运输形式单独使用，交通拥塞可能在受到进度计划和确保时间的干扰中而发生。

（3）汽车被认为是高能耗和区域使用的，以及是城市中噪声和空气污染的主要来源。

3．水路运输

水路运输是指船舶运输的过程，如驳船、艇、轮船或帆船，航行在如海、洋、湖泊、运河或河流之上。水路运输用于运送单位价值较低的大宗货物。19 世纪第一台蒸汽船是利用蒸汽机来驱动车轮或螺旋桨来移动船只。蒸汽是通过木材或煤来产生的。现在大多数船只的引擎使用的是石油精炼型船用燃料。一些专门的船只，如潜艇，利用核能产生蒸汽。

优势：

（1）现代海上运输是运输大量不易损坏货物的非常有效的方法。

（2）对于使用者来说，这是世界范围内运送货物的最便宜的方法。对于横贯大陆的运输来说，水运明显比空运成本低。

劣势：

（1）主要缺点是船舶的速度很慢，尽管船舶持续工作不停顿。

（2）虽然船舶相对安全，但是如果出现事故，将可能涉及严重的污染，有时甚至失去生命。

4．航空运输

航空运输是仅次于火箭的第二高速运输方式。在飞行中，飞机的机组人员必须与地面的通信站保持联系，提供所在区域的细节，接受其他飞机的位置信息和地面站给予的指示。

优势：

（1）航空运输的主要优势是行驶速度。飞行距离越长，为客户节省的时间就越多。

（2）短距离或无法进入的区域都可以使用直升飞机。

（3）航空运输具有良好的公众形象，被认为富有魅力。

劣势：

（1）飞机的起降需要机场，而且选址远离市区，这使其缺乏灵活性。

（2）对于货运来说，相对于海上运输，航空运输对托运人来说非常昂贵，货物运载能力小。

（3）高成本和能源消耗。

（4）受天气影响很大。

5．管道运输

管道运输通过管道运送货物；最常见的是液体和气体的传送。任何化学性质稳定的液体或气体都可以通过管道运送。短距离系统运送污水、泥浆、水和其他的细屑，而长距离网络主要运送石油和天然气。

优势：

（1）管道主要优势在于对环境无害，因为它们很容易被掩埋，可以遍及困难的地形和水下。它们不会释放出气体或产生大量的噪声，并可以被景观掩饰。

（2）另一个优点是，在很大程度上由于高度的自动化，控制泵和阀仅需要很少的维修人员。

劣势：

（1）根据实际使用情况，每单位运输量的成本上升迅速，因为在运营总成本中固定费用的比例很高。

（2）它们地理上不灵活，在固定地点提供服务，运送能力有限且不能改变以适应需求的突然激增。

阅读材料

运输服务的特点——公路汽车运输

客户服务是物流管理中的一个重要组成部分。物流管理的每一个活动都有有助于提升运输公司对客户的服务水平，虽然运输才是对客户服务最重要的影响因素。影响客户服务水平的最重要的运输服务特点是：可靠性（服务的一贯性）、运行时间、市场占有率（提供门到门服务的能力）、灵活机动性（对于各类物品都可以运送并满足托运人的专门要求）、丢失和损坏率，以及运送者提供超过基本服务的能力（例如，成为托运者全部市场项目的一部分）。

自20世纪60年代起，美国公路汽车运输取代了铁路运输占据了货物运输的显著位置。公路运输公司运送了超过总量75%的农产品，如新鲜肉和冻肉、乳制品、烘焙产品、糕点糖果、饮料酒水还有雪茄。许多工业产品也有公路汽车运输承送，包括娱乐运动产品、玩具、手表、钟表、农场机械、收音机、电视机、留声机、唱片、地毯、衣物、药品和办公用品、计算机用品。大多数的日用消费品也由公路汽车运输承运。通常情况下，公路汽车运输公司与航空运输竞争小件物品的运送，与铁路运输竞争大宗货物的运送。

一个高效的公路汽车运输公司可以与一个航空公司竞争任何形式的点到点运输服务，假如运送的距离在1 000英里或以内。这是由于汽车运输公司通过货车货运站实现了较高的效率。

公路汽车运输比其他运输形势更加灵活多样。通过广阔的公路运输网使得汽车运输的灵活性成为可能，因此能够使它们可以在几乎所有的起点到终点中提供点到点服务。公路汽车运输的多样性在于它们可以在不同的距离中运送各类规格和重量的产品。事实上，任何产品，

特别是一些对设备改装很有必要的，可以通过公路汽车运送。它们的灵活性和多样性使它们在美国和世界上其他地区的运输界占据显要位置。

总之，公路汽车运输为客户提供了快捷、可靠和低风险低损耗的服务。公路汽车运输公司比铁路运输提供了更快捷的服务，以及在短途运输中可与航空运输相媲美的服务。许多公路运输企业公司，特别是那些提供准时制项目的公司，是基于预定安排好的日程表运作的。这样使得它们拥有极短而可靠的运送时间。公路汽车运输的损失率大体上低于铁路运输，而比航空运输略高一些。再没有其他运输方式可以拥有像公路汽车运输这样的市场占有率了。

通过公路运输的货物的总量近年来保持着平稳增长。它的发展趋势似乎将继续向前迈进。只要它可以提供处于铁路运输和航空运输之间的快捷高效服务，公路汽车运输业将继续阔步前进。



Chapter 4

Inventory Management

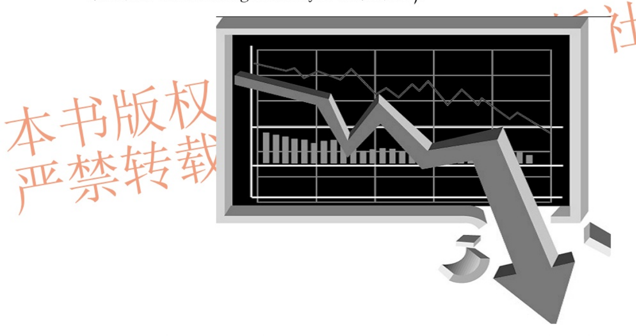


Case Study

Why Does an Inventory Error Affect Two Periods?

An **inventory** error affects two periods because: the **ending inventory** of one period will become the **beginning inventory** for the following period; and the calculation of the cost of goods sold is beginning inventory + purchases—ending inventory.

We will demonstrate this with some amounts. Let's assume that a company began on December 1, 2014. During the month of December it **purchased** or manufactured US $100,000 of goods. At the end of December 31, the company reported that its ending inventory was US $15,000. As a result, its balance sheet will report inventory of US $15,000 and its **income statement** will report cost of goods sold of US $85,000. In January 2015 it purchases US $130,000 of goods and at the end of January 31 it reports inventory of US $20,000. It will report January's cost of goods sold as US $125,000 (beginning inventory of US $15,000 plus purchases of US $130,000 minus ending inventory of US $20,000).



Now let's assume that only one error occurred and it involved the calculation of the December 31 ending inventory. Instead of the US $15,000 that had been reported, the true amount of inventory was US $19,000. That meant the December 31 balance sheet understated the true cost of inventory by US $4,000. It also meant that the income statement's cost of goods sold was not US $85,000. Rather, the true cost of goods sold was US $81,000 (US $100,000 minus US $19,000 of inventory). In January, the true cost of goods sold is US $129,000 (beginning inventory of US $19,000 plus the purchases of US $130,000 minus the January 31 inventory of US $20,000).

To recap, the December 31 balance sheet reported the incorrect ending inventory and the December and January income statements reported the incorrect cost of goods sold, and **gross profit** and net income. The true cost of goods sold for December was US $81,000—not the

US $85,000 that was reported. The true cost of goods sold for January was US $129,000—not the US $125,000 that was reported. That one error in calculating the December 31 inventory cost resulted in December's cost of goods sold being too high and January's cost of goods sold being too low. That in turn meant that the reported gross profit for December was US $4,000 too low and January's reported profit was US $4,000 too high.



Outline

The case indicates the importance of inventory in a company. Let's learn more about Inventory and management methods.

【Key Words】

Inventory [ˈinvəntri]	*n.*	存货清单；财产目录，财产目录的编制；存货总值
ending inventory		期末存货
beginning inventory	*n.*	期初存货
purchases[ˈpɜːtʃəs]	*n.*	购买；采购
income statement	*n.*	收益表
gross profit	*n.*	毛利；总利润，利益毛额

Text A Introduction of Inventory



【参考视频】

1. Definition of inventory management

Inventory refers to **stocks** of anything necessary to do business. [1] Raw materials, goods in process and finished goods all represent various forms of inventory. Each type represents money tied up until the inventory leaves the organization and is paid for.[2] For this reason it is **undesirable** to hold greater stocks than is necessary.[3] On the other hand, inadequate levels of stock create danger of production hold-ups or failure to meet customer demand.

Unless inventories are controlled, they can be unreliable, inefficient, and costly. Inventory management involves the management of all aspects relating to **stockholding**, with the aim of providing the desired level of customer service at **optimal** cost.[4]

2. The purpose of inventory

One reason for having inventory is the convenience of having things available as and when required.[5] What needs to be available will depend on the type of organization or industry but might include:[6]

(1) Production materials (raw materials and components) to support manufacture.[7]

(2) **Spares** and **consumables** for repair and maintenance activities.[8]

(3) Finished products ready for delivery to the final customer.[9]

Another factor is the possibility of cost reduction by taking advantage of **bulk discount** from suppliers. By having in bulk, we accept a relatively high level of stocks in exchange for a reduction in the purchase price.

We may also hold stocks as a buffer against things going wrong.[10] For example, we might hold a high level of finished goods so that we can guarantee to meet customer demand. Similarly, we might hold a high level of raw materials stock so as to avoid any hold-up in the production process.[11]



3. Inventory classification

It is important to know the key **classifications** of inventory because the classification influences the way the inventory is managed. Inventory is most frequently classified as cycle (base) stock, **safety (buffer) stock**, transit (pipeline) stock, speculative stock, and dead stock.

(1) **Cycle (base) inventory.** Cycle or base stock refers to inventory that is needed to satisfy normal demand during the course of an order cycle, if demand and lead time is constant only cycle stock is necessary.[12]

(2) **Safety (buffer) inventory.** Safety or buffer inventory refers to inventory that is held in addition to cycle stock to guard against **uncertainty** in demand and/or **lead time.**[13] Generally, the higher the level of buffer inventory, the better the firm's customer service. This occurs because the firm suffers fewer "stock-out". Obviously, the better the customer service, the greater the **likelihood** of customer satisfaction.

(3) **Transit inventory**. Transit inventories result from the need to transport items or material from one location to another. Goods shipped by truck or rail can sometimes take days or even weeks to go from a regional warehouse to a retail facility. The increase of transit time for these inventories would lead to an increase in the size of the transit inventory.

(4) **Speculative** inventory. Oftentimes, firms will purchase and hold inventory that is **in excess of** their current need for a possible future event. Such events may include a price increase, a seasonal increase in demand. This **tactic** is commonly used by retailers, who always build up inventory months before the demand for their products will be unusually high (e.g., at Halloween or Christmas).[14]

(5) **Dead inventory.** Dead inventory refers to product for which there is no demand—at least under current marketing practice. Because dead **inventory increases carrying cost**, reduces inventory **turnover** and takes up inventory space in warehousing facility, companies should minimize the size of dead inventory. [15]

【Key Words】

stock [stɔk]	*n.*	库存；股票；原料
undesirable [ˈʌndiˈzaiərəbl]	*adj.*	不需要的，不受欢迎的，令人不快的
stockholding [ˈstɔkˌhəuldiŋ]	*n.*	库存量控制
optimal [ˈɔptiməl]	*adj.*	最佳的，最理想的，最优，最佳
spare [spɛə]	*adj.*	多余的，剩下的
	n.	备品，备份
consumable [kənˈsju:məbl]	*adj.*	可消费的
	n.	消费品
bulk discount		批量折扣
classification [ˈklæsifiˈkeiʃən]	*n.*	分类，分级
safety (buffer)inventory		安全（缓冲）库存
uncertainty [ʌnˈsə:tnti]	*n.*	变化无常，不确定
lead time		提前期，前置期
likelihood [ˈlaiklihud]	*n.*	可能，可能性
transit inventory		调节库存
speculative [ˈspekjuˌlətivˈ]	*adj.*	投机的
in excess of		超过
tactic [ˈtæktik]	*n.*	策略，战略
inventory carrying cost		库存持有成本
turnover [ˈtə:nˌəuvə]	*n.*	流通量，周转

【Notes to Text A】



【对应翻译】

[1] Inventory refers to stocks of anything necessary to do business.

“necessary to do business”是形容词结构后置，在句中作定语，修饰“anything”。

“inventory”和“stock”不同：“inventory”指的是“详细目录，存货，财产清册，总量”，强调的是“存货总量”；而“stock”是指对货物的“储存”。

[2] Each type represents money tied up until the inventory leaves the organization and is paid for.

“tied up”是过去分词短语作定语，修饰“money”，相当于定语从句“which is tied up”。

[3] For this reason it is undesirable to hold greater stocks than is necessary.

“it”是形式主语，后面的不定式结构“to hold…”是真实主语。

“than is necessary”是省略语，完整语应为“than it is necessary”，在口语中也可以直接写为“than necessary”。

[4] Inventory management involves the management of all aspects relating to stockholding, with the aim of providing the desired level of customer service at optimal cost.

“relating to stockholding”是“动词+ing 短语”作定语的用法，修饰名词“aspects”，相当于定语从句“which relate to”。

“with the aim of”意为“目的是……”。

[5] One reason for having inventory is the convenience of having things available as and when required.

“having inventory”和“having things available”是两个“动词+ing”短语，分别作介词“for”和“of”的宾语。

“as and when required”意为“按照所需并在需要的时候”，这仅是英语的一个通用的表达方法，实际翻译时译为“在需要时”即可，否则句子就会显得臃肿。

[6] What needs to be available will depend on the type of organization or industry but might include:

“what needs to be available”引导的是一个主语从句。

“depend on”本意为“依靠……，信赖……”，这里意为“取决于……”，例如：

Whether we leave or not will depend on the weather condition. 我们是否动身将取决于天气情况。

[7] Production materials (raw materials and components) to support manufacture.

“to support manufacture”是介词语，起到修饰性形容词的作用。

[8] Spares and consumables for repair and maintenance activities.

“for repair and maintenance activities”是介词短语，起修饰名词的作用。

[9] Finished products ready for delivery to the final customer.

“ready for…”是形容词短语后置作定语的用法，修饰“finished products”。

[10] We may also hold stocks as a buffer against things going wrong.

“a buffer against…”意为“应对……的一种缓冲或缓解”。

“against’ things going wrong”相当于“against things which may go wrong”。

[11] …so as to avoid any hold-up in the production process.

“so as to”相当于“in order”，意为“以便，以致”。

“hold-up”也作“holdup”，意为“（某事在进行中的）停顿，耽搁，（交通）堵塞”等。

[12] Cycle or base stock refers to inventory that is needed to satisfy normal demand during the course of an order cycle, if demand and lead time is constant only cycle stock is necessary.

“inventory that is needed to satisfy normal demand during the course of an order cycle”是定语从句，修饰“inventory”。

“if demand and lead time is constant only cycle stock is necessary”是状语从句。

[13] Safety or buffer inventory refers to inventory that is held in addition to cycle stock to guard against uncertainty in demand and/or lead time.

“referred to.. to guard against” 是一个动词不定式结构。

“inventory that is held in addition to cycle stock”是定语从句，修饰“inventory”。

[14] This tactic is commonly used by retailers, who always build up inventory months before the demand for their products will be unusually high (e.g., at Halloween or Christmas).

“who always build up inventory months before the Demand for their products will be unusually high (e.g., at Halloween, Christmas)” 是定语从句，其中 “before” 是介词，起时间状语的作用。

[15] Because dead inventory increases inventory carrying cost, reduces inventory turnover and takes up space in warehousing facility, companies should minimize the size of dead inventory.

“because…” 是原因状语从句，“因为……所以……” 的意思。

【Exercises to Text A】

【参考答案】

I. Fill in the blanks.

identify	monetary losses	waste management	limit
involve	appreciate	financial benefit	a range of
eliminate	waste disposal	in order of	identify
strict	indicate	business turnover	

Companies often underestimate how much waste actually costs — did you know, for example, that it could be up to 4 per cent of your ______? All of the waste that you produce has a cost associated with it, but before you can begin reducing waste you need to ______ where it comes from.

Lack of appropriate ________ costs companies heavily, not only in terms of _______, but also the long-term impacts on the environment and sustainability. It is important to ______ that the true cost of waste is more than just the cost of disposal. It also includes the additional cost of raw materials, energy and labour ______ in the generation of waste. All together this can be 5—20 times higher than the cost of disposal.

As well as the _______, effective waste management helps organizations to become compliant with increasingly _______ legislation designed to _______ the environmental impact of landfill sites.

Effective waste management offers ______ benefits to companies including:

(1) Cost savings (reduced raw material consumption, reduced _______ cost savings due to reduced volumes and recovered value of wastes) that go directly to the bottom line.

(2) A competitive advantage.

(3) Reduced impact to environment.

(4) Improved public perception.

(5) Development of new and more sustainable processes.

(6) Development of new products.

The waste hierarchy ______ possible waste disposal options and ranks them _____ increasing environmental impact. The aim is to work your way up the hierarchy from disposal until you end up ______ all waste where possible.

The way that you currently deal with waste will ______ the stage you are at on the hierarchy. Organizations should aspire to work their way up the hierarchy with the aim of turning the 4 per cent of turnover into profit.

Ⅱ. Reading and answering questions.

There are three types of stock that a business can hold:

(1) Stocks of raw materials (inputs brought from suppliers waiting to be used in the production process).

(2) Work in progress (incomplete products still in the process of being made).

(3) Stocks of finished products (finished goods of acceptable quality waiting to be sold to customers).

The aim of stock control is to minimize the cost of holding these stocks whilst ensuring that there are enough materials for production to continue and be able to meet customer demand. Obtaining the correct balance is not easy and the stock control department will work closely with the purchasing and marketing departments.

The marketing department should be able to provide sales forecasts for the coming weeks or months (this can be difficult if demand is seasonal or prone to unexpected fluctuation) and so allow stock control managers to judge the type, quantity and timing of stocks needed.

It is the purchasing department's responsibility to order the correct quantity and quality of these inputs, at a competitive price and from a reliable supplier who will deliver on time.

As it is difficult to ensure that a business has exactly the correct amount of stock at any one time, the majority of firms will hold buffer stock. This is the "safe" amount of stock that needs to be held to cover unforeseen rises in demand or problems of reordering supplies.

Good stock management by a firm will lower costs, improve efficiency and ensure production can meet fluctuations in customer demand. It will give the firm a competitive advantage as more efficient production can feed through to lower prices and also customers should always be satisfied as products will be available on demand.

However, poor stock control can lead to problems associated with overstocking or stock-outs.

If a firm holds too much buffer stock (stock held in reserve) or overestimates the level of demand for its products, then it will overstock. Overstocking increases costs for businesses as holding stocks is an expense for firms for several reasons:

(1) Increases warehouse space needed.

(2) Higher insurance costs needed.

(3) Higher security costs needed to prevent theft.

(4) Stocks may be damaged, become obsolete or perish (go out of date).

(5) Money spent buying the stocks could have been better spent elsewhere.

The opposite of an overstock is a stock-out. This occurs when a businesses runs out of stocks. This can have severe consequences for the business:

(1) Loss of production (with workers still having to be paid but no products being produced).

(2) Potential loss of sales or missed orders. This can harm the reputation of the business.

In these circumstances a firm may choose to increase the amount of stock it holds in reserve (buffer stock). There are advantages and disadvantages of increasing the stock level.

Advantages	Disadvantages
Can meet sudden changes in demand	Costs of storage—rent and insurance
Less chance of loss of production time because of stock outs	Money tied up in stocks not being used elsewhere in the business
Can take advantage of bulk buying economies of scale	Large stocks subject to deterioration and theft

Questions：

1. The aim of stock control is (　　).

A. to minimize the cost of holding stocks and ensure production

B. to order the correct quantity and quality of stocks

C. to provide sales forecasts for the coming weeks or months

D. to judge the type, quantity and timing of stocks needed

2. The word “buffer” in Line 19 probably means (　　).

A. protection　　B. quantity　　C. reserve　　D. insurance

3. The costs of overstocking include the following except (　　).

A. increases warehouse space and higher insurance costs needed.

B. potential loss of sales or missed orders.

C. higher security costs needed to prevent theft.

D. stocks may be damaged, become obsolete or perish.

4. Which of the following is one of the advantages of increasing the stock level? (　　)

A. Costs of storage, rent and insurance

B. Less chance of loss of production time because of stock-outs

C. Money tied up in stocks not being used elsewhere in the business

D. Large stocks subject to deterioration and theft

5. Which of the following is not discussed in the passage? (　　)

A. The types of stocks　　B. The purpose of stock control

C. The importance of stock control　　D. The methods of stock control

Ⅲ. Translation.

1. The inventory requirements of a firm depend on the network structure and the desired level of customer service.

2. Similarly, transport vehicles break down, raw materials may suddenly be unavailable.

3. For all of these reasons, inventory is utilized to ensure that customer needs are met even when the production process itself interrupted.

4. The finished products can be shipped to field warehouses where they are mixed to fill customer order.

5. Excessive inventories may compensate for deficiencies in basic design of a logistics network and to some degree inferior management.

Text B Principles of Inventory


【参考视频】

1. ABC analysis of inventory

Firms that carry hundreds or even thousands of different parts can be faced with the impossible task of monitoring the inventory levels of every single part. To solve this problem, many firms use an ABC analysis of inventory. This **approach** recognizes that inventories are not of equal value to a firm and that, as a result, all inventory should not be managed in the same way.[1] According to ABC analysis, 20 percent of all inventory items represent 80 percent of inventory costs. Therefore, a firm can control 80 percent of its inventory costs by monitoring and controlling 20 percent of its inventory. But, it has to be the correct 20 percent.[2]

The top 20 percent of the firm's most costly items are termed "A" items (this should **approximately** represent 80 percent of total inventory costs). Items that are extremely inexpensive or have low demand are termed "C", with "B" items falling in between A and C items. B items usually represent about 30 percent of the total inventory items and 15

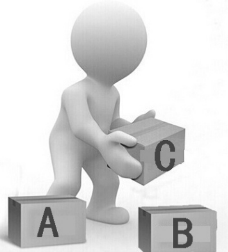
percent of the costs. C items generally consist 50 percent of all inventory items but only around 5 percent of the costs (See Table 4-1).

Table 4-1 ABC analysis

	A	B	C
Item	5%～10%	15%～25%	25%～85%
Value	70%～85%	10%～20%	5%～10%
Inventory control	Tight	Normal	Minimal
Data accuracy	High	Reasonable	Low
Review of usage rate and demand	Frequent	Occasional	Waived sometimes
Cycle counting	Frequent	Less frequent but regular	Minimal

By **classifying** each inventory item as an A, B or C, the firm can determine the resources (time, effort and money) to each item. Usually this means that the firm monitors A items very closely but can check on B and C items on a **periodic** basis (for example, monthly for B items and **quarterly** for C items).[3]





2. Economic order quantity

The EOQ is the replenishment practice that **minimizes** the combined inventory carrying and ordering cost. [4] **Identification** of such a quantity assumes that demand and costs are relatively stable throughout the year. Since EOQ is calculated on an individual product basis, the basic **formulation** does not consider the impact of joint ordering of products.[5]

The most efficient method for calculating EOQ is mathematical. A policy **dilemma** regarding whether to order 100, 200, or 600 units was discussed. The answer can be found by calculating the applicable EOQ for the situation.

To make the appropriate calculations, the standard formulation for EOQ is:

$$\text{EOQ}=\sqrt{\frac{2CD}{KU}}$$

Where EOQ=economic order quantity;

C=cost per order;

D=annual sales volume, units;

K=annual inventory carrying cost per Unit;

U=cost per unit.

Substituting from Table 4-2:

$$\mathrm{EOQ}=\sqrt{\frac{2\times 2{,}400\times 19}{0.2\times 5}}=302\approx 300$$

Table 4-2 Factors of determining EOQ

Annual demand volume	2,400 units
Unit value at cost	US $5.00
Inventory carrying cost percent	20% annually
Ordering cost	US $19.00 per order

【Key Words】

approach [əˈprəutʃ] *n.* 方法，途径，接近，走进，步骤

approximately [əprɔksiˈmətli] *adv.* 近似地，大约

classify [ˈklæsifai] *vt.* 分类（classifying 是其现在分词形式）

periodic [piəriˈɔdik] *adj.* 周期的，定期的

quarterly [ˈkwɔːtəli] *adj.* 每季的

adv. 每季地

economic order quantity 经济订货量，最佳订货量

minimize [ˈminimaiz] *vt.* 将……减到最小

identification [aiˌdentifiˈkeiʃən] *n.* 鉴定，辨认

formulation [ˌfɔːmjuˈleiʃən] *n.* 形成；简洁陈述；公式

dilemma [diˈlemə] *n.* 困境，进退两难

substituting [ˈsʌbstitjuːtiŋ] *n.* 代替（substitute 的现在分词形式）

【Notes to Text B】

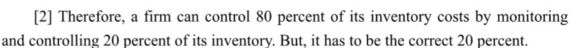
[1] This approach recognizes that inventories are not of equal value to a firm and that, as a result, all inventory should not be managed in the same way.



【对应翻译】

“recognizes that” 是一个宾语从句，“认为”的意思。

“are not of equal value” 这个短语意为“价值不等同”。



[2] Therefore, a firm can control 80 percent of its inventory costs by monitoring and controlling 20 percent of its inventory. But, it has to be the correct 20 percent.

“therefore” 是介词，引出下面的句子；“but” 是介词，起转折的作用。

[3] Usually this means that the firm monitors A items very closely but can check

on B and C items on a periodic basis (for example, monthly for B items and quarterly for C items).

"this means that"是宾语从句，通常用来陈述表达一个观点。

[4] The EOQ is the replenishment practice that minimizes the combined inventory carrying and ordering cost.

"the replenishment practice that minimizes the combined inventory carrying and ordering cost"是定语从句，"that minimizes the combined inventory carrying and ordering cost"修饰"practice"。

[5] Since EOQ is calculated on an individual product basis, the basic formulation does not consider the impact of joint ordering of products.

"Since…"引出原因状语从句，意思是"因为……所以……"。

【Exercises to Text B】



【参考答案】

I. Translation.

1. The typical measures of inventory commitment are time duration, depth, and width of commitment.

2. A wholesaler purchases large quantities from manufacturers and sells smaller quantities to retailers.

3. Due to the high cost of store location, retailers place prime emphasis on inventory turnover and direct product profitability.

4. Faced with this width of inventory, retailers attempt to reduce risk by pressing manufacturers and wholesalers to assume greater and greater inventory responsibility.

5. Stock-out(shortages) can be completely avoided if orders are placed at right time.

6. In other words, the production schedule "pulls" components through the system in order to the manufacturing needs.

7. DRP is a more sophisticated planning approach that considers multiple distribution stages and the characteristics of each stage.

Ⅱ. Reading and answering questions.

It can be argued that, over the last few years, the real value of trade credit has not been fully recognized. Many companies have had a strong cash flow and this, allied with a benign economic climate and steady level of corporate failures, has reduced the risk associated with trading on credit. However, the changing economic climate means that confidence in granting credit is reducing, leading to an increasing interest in credit insurance.

The cause of this has been the repricing of risk triggered by the well publicised Sub-Prime lending defaults in the USA, resulting in a shortage of finance and volatility in the stock markets, with US Sub-Prime delinquent debt rising at an alarming rate. For example, in the USA in 2003 four percent of debt defaulted after an average of 48 months. In 2006 this default figure had risen to ten percent and the average default time fallen to 12 months.

Much of this debt is ultimately owned by major financial institutions and a knock-on effect has been the reduced amount of credit available to the corporate sector.

That this increasing difficulty in obtaining additional/temporary bank funding has occurred now is particularly worrying, as quarter four into quarter one is traditionally the worst period of the year for corporate insolvencies, and a restriction in the availability of funds could increase this figure, leading to an increase in bad debt. One impact of this is that terms of payment will get longer and the cost of funding this will be tough; too tough for some. Atradius (one of the UK's largest credit insurers) have already seen requests to push terms out from 60 days and 150 days.

To compete in a competitive market sector companies need to offer credit. They also need to protect their credit risk as much as possible and manage the sales ledger cycle, so they can be confident that bad debt will not impact upon their ability to trade.

Credit Insurance provides between 80 percent—100 percent cover against the non-payment of commercial debts due to the insolvency or default of an insured customer. Companies can choose whether to insure just their export ledger, UK ledger, top accounts, selected markets/buyers or any combination. It is backed by a credit limit service and sometimes a debt collection service. Cost is calculated using a number of differing factors including previous bad debt experience, level of projected sales, trade sectors and deductibles. Willis Credit Risks are able to assess the potential credit risk within a company and offer advice on possible solutions to reducing that overall risk.

Credit Insurance can literally save the life of a company. A glazing company in the North East was hit by a number of bad debts which had a potentially catastrophic impact on their cash flow. However, they had taken out credit insurance and were able to claim on their policy. As the Finance Director of the company said at the time, "Without credit insurance we would not have been able to replace our working capital as quickly as we did following a number of insolvency losses we suffered in 2006. Credit insurance allowed our funders to remain confident in our business plan and

without this insurance our prospects of continued trading would have been slim."

Questions:

1. The word "default" in Para. 2 is closest in meaning to "(　　)".

A. degrade　　B. delicate　　C. delinquent　　D. decrease

2. According to the passage, what may cause an increase in bad debt? (　　)

A. Restriction in the availability of funds.

B. Difficulty in obtaining additional/temporary bank funding.

C. The reduced amount of credit available to the corporate sector.

D. Both A and B.

3. Atradius is a company that (　　).

A. owns many debts　　B. provides credit insurance

C. helps to collect debts　　D. buys credit insurance

4. Credit Insurance provides services in the following field except (　　).

A. export ledger　　B. top accounts

C. selected markets/buyers　　D. bank funding

5. Which of the following statements best describes the main idea of the passage? (　　)

A. Credit Insurance is very important in helping a company to protect its credit risk.

B. The changing economic climate led to an increasing interest in credit insurance.

C. Credit Insurance saved the life of a glazing company in the North East.

D. Credit Insurance provides cover against the non-payment of commercial debts.

Reading Material A

JIT[⑩] Inventory Management

1. Introduction of JIT

In the early 1970s, Toyota Motor Manufacturing developed a new production strategy that used little inventory, shortened cycle times, improved quality, and eliminated waste and costs in the supply chain.



【参考视频】



This JIT manufacturing management requires manufacturers to work in concert with suppliers and transportation providers to get required items to the assembly line at the exact time they are needed for production. The concept was also adopted by American and European automakers in response to the growing

⑩ JIT　JIT 是 Just In Time 的缩写，即准时制生产方式，又称作无库存生产方式或者超级市场生产方式。

success of their Japanese competitors. The JIT concept then spread to other industries such as computers, and became popular in manufacturing strategies around the world.

2. JIT Concept

JIT is a **philosophy** of continuous and forced problem solving. With JIT, supplies and components are "pulled" through a system to arrive where they are needed when they are needed. When goods units do not arrive just as needed, a "problem" has been identified. This makes JIT an excellent tool to help operations managers add value by driving out waste and unwanted variability. Because there is no excess inventory or excess time in a JIT system, costs from unneeded inventory are eliminated and throughput improved. Consequently, the benefits of JIT are particularly helpful in supporting strategies of rapid response and low cost.

3. Advantages of JIT

(1) More **inventory turns**. Because there is less stock on hand, the inventory that is maintained stays for a shorter period of time.

(2) Better quality. As was mentioned earlier, high quality products must be received with a JIT system, otherwise the entire benefit production process collapses.

(3) Less warehouse space needed. When there is less inventory, fewer and/or smaller warehouses are required.

4. Disadvantages of JIT

(1) Risk of **stock-outs**. When firms eliminate inventory, the risk of stocking out can rise. Managers attempt to minimize this occurrence by demanding very high levels of service from their vendors and logistics service providers.

(2) Increased purchasing costs. Purchasing **discounts** are generally associated with buying large quantities at one time. Theoretically, JIT means foregoing those **price-breaks** in favor of obtaining smaller amounts more frequently.

(3) Small channel members may suffer. JIT is sometimes criticized as a system that allows strong organizations to shift their inventory to smaller firms in the channel.

(4) Environmental issues. JIT can lead to higher levels of traffic congestion and air pollution because additional transportation is often required to maintain customer service levels in the absence of inventory.

5. **Zero Inventory**

JIT **tactics** are still being incorporated in manufacturing to improve quality, drive down inventory investment, and reduce other costs. However, JIT is also established practice in restaurants, where customers expect it, and a **necessity** in the produce business, where there is little choice.

Pacific Pre-Cut Produce, a US $14-million fruit and vegetable processing company in Tracy, California, holds inventory to zero. Buyers are in action in the very early hours of the morning. At 6 a.m., production crews show up. Orders for very specific cuts and mixtures of fruit and vegetable salads and **stir-fry ingredients** for supermarkets, restaurants, and institutional kitchens pour in from 8 a.m. until 4 p.m. .

Shipping begins at 10 p.m. and continues until the last order is filled and loaded at 5 a.m.

the next morning. Inventories are once again zero, things are relatively quiet, and then the routine starts again. The company has accomplished a complete cycle of purchase, manufacture, and shipping in about 24 hours. VP Bob Borzone calls the process the ultimate in mass-customization. "We buy everything as a bulk commodity, then slice and dice it to fit the exact requirements of the end user. There are 20 different stir-fry mixes. Some customers want the snow peas clipped on both ends, some just on one. Some want only red bell peppers in the mix, some only yellow. You tailor the product to the customer's requirements. You're trying to the need of a lot of end users, and each restaurant and retailer wants to look different."

【Key Words】

philosophy [fə'lɒsəfi]	*n.*	哲学，哲理；哲学体系，哲学思想；生活信条
inventory turns		更多的存货周转
stock-outs		缺货
discounts ['diskaʊnt]	*vt.*	打折扣，减价出售
	n.	贴现；数目；扣除额
price-breaks		梯度价
zero Inventory		零库存
tactics['tæktiks]	*n.*	战术；策略，手段
necessity [nə'sesəti]	*n.*	必需品；必要，必要性；需求
stir-fry ingredients		翻炒配料
mass-customization		大规模定制

【Questions】

1. Can JIT strategy be applied to service industry?
2. Which advantages does JIT involve?
3. What are the disadvantages of JIT?
4. How can the manufacture keep zero Inventory?



Reading Material B

New Trend of Inventory Management

1. MRP[11]

How does MRP work? MRP deals specifically with supplying materials and component parts whose demand depends upon the demand for a specific end product. Essentially, MRP begins by determining how much of the final product customers desire, and when they need it. Then MRP breaks down the timing and need for components (all of which could have different lead times) based upon that scheduled end-product need. An MRP system consists of a set of logically related procedures, decision rules, and records, which are designed to translate a master

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⑪ MRP　　MRP 是 Material Requirements Planning 的缩写，即物料需求计划。

production schedule into time-phased net inventory also re-plans net requirements as a result of changes.



MRP minimizes inventory **to the extent** that the master production schedule accurately reflects what is needed to satisfy customer demand. If the production schedule does not match demand, the company will have too much of some items and too little of others. Because the master production schedule drives the need for parts, MRP is said to be a **pull system**. In other words, the production schedule "pulls" components through the system in order to meet manufacturing needs.

2. DRP[12]

DRP is a more **sophisticated** planning approach that considers multiple distribution stages and the characteristics of each stage. DRP is the logical extension of manufacturing requirements planning, although there is one fundamental difference between the two techniques.

MRP is determined by a production schedule that is defined and controlled by the enterprise. On the other hand, DRP is guided by customer demand, which is not controllable by the enterprise. So, while MRP generally operates in a dependent demand situation, DRP operates in an independent environment where uncertain customer demand determines inventory requirements. The MRP component coordinates the scheduling and integration of materials into finished goods. MRP controls inventory until manufacturing or assembly is completed. DRP then takes **coordination** responsibility once finished goods are received in the plant warehouse.

【Key Words】

essentially[iˈsenʃəli]	*adv.*	本质上，根本上；本来
to the extent [tuːðəiksˈtent]		到……的程度
pull system		一个拉动系统
sophisticated [səˈfistikeitid]	*adj.*	复杂的；精致的；富有经验的（sophisticate 的过去分词形式）
coordination [kəuˌɔːdiˈneiʃn]	*n.*	协调；和谐

【Questions】

1. What is MRP?
2. What does MRP system consist of?
3. What is the distinction between DRP and MRP?

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⑪ DRP　DRP 是 Distribution Requirements Planning 的缩写，即分销需求计划。

参考译文

第4章　库存管理

案例分析

为什么一个库存错误会影响两个周期？

一个库存上的错误会影响两个时期，原因是：上一期的期末库存会成为下一期的期初库存；货物销售成本的计算是期初库存+采购费用-期末库存。

我们可以用一些数据来说明。假设一个公司的库存管理记录从2014年12月1日开始算起。12月份公司采购或生产出货物的库存价值是100 000美元。在12月31日，公司报告的期末库存是15 000美元。资产负债表上的库存是15 000美元，损益表报告销售成本是85 000美元。2015年1月采购了130 000美元的货物，1月31日报告的期末库存是20 000美元。1月份货物销售成本是125 000美元（期初库存15 000美元+采购的130 000美元-期末库存20 000美元）。

现在我们假设发生了一个错误，影响到了12月31日的期末库存的计算。代替以前报告的15 000美元，实际库存是19 000美元。这意味着12月31日的资产负债表少报的库存是4 000美元。这也意味着销售成本不是85 000美元，而是81 000美元（100 000美元-19 000美元）。在1月份，实际销售成本是129 000美元（期初库存19 000美元+采购的130 000美元-1月31日20 000美元库存）。

再重述一下，12月31日的资产负债表报告了不正确的期末库存，而12月和1月份的收益表报告了错误的销售成本、毛利润和净收入。12月份的实际销售成本是81 000美元——不是85 000美元。1月份的实际销售成本是129 000美元——不是125 000美元。于是，12月31日库存成本计算的错误使12月份货物销售成本过高，使1月份的货物销售成本过低。反过来，使12月份报告的毛利润低了4 000美元，1月份的毛利润高了4 000美元。

Text A

库存介绍

1．库存管理的定义

库存是指生产经营时任何必要的存货。原材料、半成品和成品都属于不同形式的库存。各类库存都表示所占用的资金，一直到存货离开公司并收到付款后才不占用资金。因为这个原因，人们不愿意持有大于其所需的库存。另外，库存不足会造成生产停顿，或者无法满足顾客的需求。

除非库存得到控制，否则会造成不可靠、低效率和高成本。库存管理涉及库存持有及所有相关方面的管理，目的是以最优成本提供期望水平的客户服务。

2．库存的目的

持有库存的一个理由是，在需要物料时可以方便地获得。需要获得什么样的物料取决于公司或行业的类别，包括以下物质：

（1）供制造用的生产材料（原材料和部件）。

（2）用于修理和维护活动的备用品和易耗品。

（3）准备给最终客户交货的成品。

持有库存的另一个原因是充分利用供应商的大批量折扣尽可能降低成本。通过大批量订货以换取采购价格的降低，我们要接受高水平的库存。

我们也可能会把持有库存作为一种缓冲，以防止事情出问题。例如，我们可能持有较高的成品库存以满足顾客的需求。同样，我们也可能持有较高的原材料库存以便避免生产进程中的任何停顿。



3．库存分类

了解库存的类别很重要，因为库存的类别影响库存管理方式。库存通常分为周转库存、安全库存、流通库存、投机库存和呆滞库存。

（1）周转库存。周转库存是指那些用于满足一个订货周期内正常需求的库存，如果需求和提前期是不变的，那么只有周转库存是必需的。

（2）安全（缓冲库存）。安全（缓冲库存）是指周转库存之外的额外存货，以应对需求和提前期的不稳定性。一般来说，缓冲库存水平越高，所能提供的客户服务水平越高。这是因为公司更少地遭受缺货的影响。很明显，客户的服务水平越好，客户的满意度就越高。

（3）流通库存。流通库存是由于需要把物品或材料从一个地点运送到另一个地点而产生的。卡车或火车运输商品从一个地方的仓库运到零售点可能要花几天或几个星期。库存流通时间的增加会增加流通库存的规模。

（4）投机性库存。公司时常为了未来可能的事件采购和持有超出现有需求的库存。这些事件包括价格的上涨、季节性的需求等。零售商们常使用这种策略，他们总是提前几个月就储备库存以应对产品需求量的提高（如万圣节、圣诞节）。

（5）呆滞库存。呆滞库存是指不需要的产品库存——至少在目前的市场情况下。因为呆滞库存会增加库存持有成本，降低库存周转速度，并且占用仓储空间，所以企业应该将呆滞库存降到最低。

Text B

库存的原则

1．ABC 库存分析

持有成百上千不同零部件的公司面临着监控每一个零部件库存水平的艰巨任务。为了解

决这一问题，许多公司采用 ABC 库存分析法。这种方法认为不同的存货对企业的价值是不一样的，因而，不能对所有的存货用同一种方法进行管理。按照 ABC 分析法，所有库存中的 20%占用了 80%的库存成本。因此，一个公司能够通过监控 20%的库存来控制 80%的库存的成本。但是，那 20%的库存必须是正确的。

公司库存中价值最大的 20%被划为“A”类商品（大约占总库存成本的 80%）。那些最便宜的物品被划分为“C”类物资，“B”类物资处于“A”与“C”类物资之间。“B”类物流通常占总库存物资的 30%，但成本占 15%。“C”类物资占总库存物资的 50%，但成本仅占 5%（见表 4-1）。

表 4-1　ABC 分析法

	A	B	C
物品	5%～10%	15%～25%	25%～85%
价值	70%～85%	10%～20%	5%～10%
库存控制	严格	一般	简单
数据精确度	高	一般	低
使用率与需求检查	频繁	偶尔	放弃
循环盘点	频繁	一般	极少

通过把存货分为 A、B、C 三类，公司能决定如何把资源分配给每一项物资时间、工作和资金。通常公司密切监控 A 类物资，但是周期性地检查 B 类和 C 类物资（例如，B 类物资每月监控，C 类物资每季度监控）。

2．经济订货量

经济订货量是使综合库存持有成本和订购成本最小化的补货规则。订购数量的确定是假定全年的需求和成本是相对稳定。因为经济订货量是按单个产品计算，所以经济订货量的基本公式并不考虑产品联合订购的影响。

最有效的计算经济订货量的方式是数学法。关于订购 100 件、200 件还是 600 件的数量难题进行讨论，答案可以通过计算特定情况下的适合的经济量得到。

为做出合适的计算，经济订货量的标准公式是：

$$\mathrm{EOQ}=\sqrt{\frac{2CD}{KU}}$$

公式中，EOQ 代表经济订货批量；

C 代表订购成本；

D 代表年需求数量；

K 代表年储存费率；

U 代表产品单价。

将表 4-2 的数据代入公式中：

$$\mathrm{EOQ}=\sqrt{\frac{2\times 2\,400\times 19}{0.2\times 5}}=302\approx 300$$

表 4-2 决定 EOQ 的因素

年需求数量	2 400 件
产品单价	5 美元
年储存费率	每年 20%
订购成本	每单位 19 美元

阅读材料 A

JIT 库存管理

1. JIT 介绍

20 世纪 70 年代初，丰田汽车公司开发了一种新的生产战略，即在供应链中持有极少量库存、缩短周期、提高质量并减少浪费和成本。

JIT 制造管理要求制造商与供应商和运输商密切合作，实现将所需物品在准确的生产需求时间送达到装配生产线上。由于日本竞争者持续不断的成功，美国和欧洲汽车制造商也开始采纳这个管理理念。于是，JIT 理念被推广到计算机等其他行业，成为全球制造业的普遍战略。

2. JIT 的概念

JIT 是一种不断地强制解决问题的理念。在 JIT 之下，供应品和部件被一个系统"推动"，在需要的时间到达需要的地点。一旦物品在需要时不能按时到达，"问题"就找到了。这使 JIT 成为一个卓越的工具，能帮助运营管理者消除浪费和不必要的差异性，从而增加价值。因为在 JIT 系统里没有多余的库存和时间，不必要的库存所导致的成本被消除了，并且产量提高了。因此，JIT 的优势在于支持快速反应和低成本战略着实有效。

3. JIT 的优势

（1）更快的库存周转。因为手头上存货少了，所持有的库存的停留时间就短了。

（2）更好的质量。如上所述，JIT 系统只接收高质量产品，否则整个产品生产流程将中断。

（3）更少的仓储空间需求。当库存少了，所需要的仓库也就少了。

4. JIT 的劣势

（1）缺货的风险。当企业消除了库存，缺货的风险就会增加。管理者试图通过从供应商和物流服务提供者要求高水平的服务使缺货概率最小化。

（2）采购成本提高。采购折扣一般只与一次性大量购买有关。理论上，JIT 意味着为了获得频繁的小批量供货而放弃价格优惠。

（3）渠道中弱势成员受损。有人指责 JIT 系统允许大企业将库存转嫁给渠道中的弱小企业。

（4）环境问题。JIT 可导致更严重的交通堵塞和空气污染，因为在没有库存的情况下，经常需要增加额外的运输来维持客户服务水平。

5. 零库存

JIT 策略仍被应用于制造业中以提高质量、降低库存投入及降低其他成本。然而，JIT 也应用于顾客期待着的餐饮业，并且应用在选择性很少的生产企业中必然。

Pacific Pre-Cut Produce 是一家位于加利福尼亚州特蕾西的水果蔬菜加工公司，年产值达 1 400 万美元，实现了零库存。顾客总是在一早就开始行动。早上 6 点，生产人员到岗。从早

上8点到下午4点，公司不断地收到来自于超市、餐馆、单位食堂的订单，要求非常特殊切制、混合的水果和蔬菜的色拉和用于热炒的配菜。

下午10点开始运送，一直持续到第二天早上5点最后一个订单处理、装载完毕。库存再次达到零库存，一切又归于平静，然后又一轮的流程重新开始。该公司在大约24小时内实现了包括采购、生产和运输在内的一个完整的循环。公司副总裁Bob Borzone称这个流程为大量定制化的最佳体现。“我们购买任何东西都是大批量，然后切成薄片或切成小块来满足最终客户的需求。有20种不同的煎炒配菜。一些顾客希望豌豆两头都修剪，而一些顾客只要修剪一头。一些顾客希望只混合进红色胡椒粉，而有些只喜欢黄色的胡椒粉。你需要根据顾客需求来定制产品。你得努力满足大量最终顾客的需求，而各家餐馆和零售商都想与众不同。”

阅读材料B

库存管理的新趋势

1．MRP

MRP如何运行？MRP专门处理材料和零部件的供应，它们的需求取决于其他某一最终产品的需求。本质上，MRP首先要确定最终产品的顾客需求量，以及顾客何时需要。然后，MRP根据最终产品需求的日期，分解组件的需求时间和数量（所有的部件可能都有不同的前置期）。MRP系统包括一系列逻辑相关的流程、决策规则和记录，它们将主生产计划转换成阶段性净库存及基于变化的净需求的再次计划。

MRP在使主生产计划能准确反映顾客需求的情况下，使库存最小化。如果生产计划不能与需求相适应，企业将出现某些部件存储过量，而另一些部件短缺的情况。因为主生产计划决定着部件的需求，MRP被认为是一个拉动式系统。换句话说，为了满足制造需求，生产计划“拉动”部件在系统中移动。

2．DRP

DRP是一个更复杂的计划方法，它考虑多个分销阶段以及各个阶段的特点。虽然这两种技术有一个基本的区别，DRP可被视为是MRP的一个逻辑扩展。

MRP是由企业制订和控制的生产计划来决定的。而DRP是由企业无法控制的客户需求所导向的。因此，MRP通常在一个相关需求的环境里运行，而DRP在一个由不确定的客户需求决定库存需求的独立环境里运行。MRP将原料的进度安排和整合与最终产品相协调。MRP控制库存直到制造或组装完成。而DRP在最终产品被运送到工厂仓库时才行使协调责任。



Chapter 5

Warehouse Management



Case Study

Public Bonded Warehouse

Recently a public **bonded warehouse** has been set up in the District B of International Logistics Center (the second section), which is the first public bonded warehouse in Yiwu. The bonded warehouse has an area of 5,184 square meters with a **supplementary** loading area of 650.5 square meters.The warehouse is for the storage of bonded goods and goods whose **customs formalities** have not been completed, mainly including goods for export with materials provided by customers, goods for export with imported materials, and goods to be exported again after a temporary delay. Besides, it also deals with other businesses, including approving the **consignment** sales, fast transfer and exhibition of bonded goods.



Outline

Please illustrate types of warehouse.

【Key words】

bonded warehouse	*n.*	关栈，（海关）保税仓库；关栈仓库
supplementary [ˌsʌpliˈmentri]	*adj.*	增补的，追加的
	n.	补充者；增补物
customs formalities		报关单；海关手续
consignment [kənˈsainmənt]	*n.*	托运，运送；委托，托管



Text A Types of Warehousing

1. Overview of warehousing

Warehousing is an **integral** part of a logistics system. There are estimated 750,000 warehouse **facilities** worldwide, including professionally managed warehouses, and

company **stockrooms**, garages and even garden sheds. When a firm decides to store product, it faces two warehousing options: rented facilities, called public warehousing, or owned or leased facilities, called private warehousing.[1]

Firms must examine closely to choose between the two options. For example, the price of a public warehouse is most probably higher because it will be operated at a profit; it may also have selling and advertising cost.[2] However, a firm makes no initial investment in the facilities. For customer service, private warehousing can generally provide higher service levels because of its more specialized facilities and equipment, and its better **familiarity** with the firm's products, customers and market. In some instances, **innovative** public warehouses can provide higher levels of service owning to their expertise and strong **competitive** drive to serve the customer.[3]





【参考视频】

In the following, we will discuss about public warehousing.

2. Public warehouses

There are many types of public warehouses, including:

(1) General merchandise warehouses for manufactured goods.

(2) Refrigerated storage warehouses.

(3) Bonded warehouse.

(4) Special commodity warehouses.

(5) Bulk storage warehouses.

3. General merchandise warehouse

The general merchandise warehouse is probably the most common form. It is designed to be used by manufacturers, distributors, and customers for storing almost any kind of product.

4. Refrigerated warehouses

Refrigerated or cold storage warehouses provide a

temperature-controlled storage environment. They tend to be used for preserving **perishable** items such as fruits and vegetables. However, a number of other items (e.g., frozen food products, some **pharmaceuticals**, **photographic paper** and film, and furs) require this type of facility.[4]

5. Special commodity warehouses

Special commodity warehouses are used for particular agricultural products, such as grains, wool, and cotton. Ordinarily each of these warehouses handles one kind of product and offers special services specific to that product.[5]

6. Bonded warehouses

Some general merchandise or special commodity warehouses are known as bonded warehouses. Goods such as imported tobacco and alcoholic beverages are stored in this type of warehouse, although the government retains control of the goods until they are distributed to the market place.[6] The advantage of the bonded warehouse is that the import duties need not be paid until the merchandise is sold, so that the importer has the funds on hand to pay these fees.

7. Bulk storage warehouses

Bulk storage warehouses provide tank storage of liquids and open or sheltered storage of dry products such as coal, sand, and chemicals.

【Key Words】

integral [ˈintigrəl]	*adj.*	完整的
facilities [fəˈsilitis]	*n.*	设施，设备，工具
stockroom [ˈstɔkrʊm]	*n.*	储藏室
familiarity [fəˌmiliˈæriti]	*n.*	熟悉，了解
innovative [ˈinəʊveitiv]	*adj.*	创新的，革新的
competitive drive		竞争驱动力
temperature-controlled		温控的
perishable [ˈperiʃəbl]	*adj.*	易腐烂的，易变质的
pharmaceutical [ˌfɑːməˈsjuːtikəl]	*n.*	药品，成药
photographic paper		相纸

【Notes to Text A】


【对应翻译】

[1] When a firm decides to store product, it faces two warehousing options: rented facilities, called public warehousing, or owned or leased facilities, called private warehousing.

“rented”意为“租赁的”；“facilities”意为“设施，设备”；“warehousing”意为“仓储”。

[2] For example, the price of a public warehouse is most probably higher because it will be operated at a profit; it may also have selling and advertising cost.

“at a profit”意为“在获取一定的利润基础上”。

“because”表示“……的原因是因为……”这一意义时，一般要用到这样的句型：The reason why he can’t come is that he is tired. 他不能来是因为他累了。在这一结构中，尽管不少人认为可将“that”改用“because”，但也有不少人反对这一用法，所以要慎用。

[3] In some instances, innovative public warehouses can provide higher levels of service owning to their expertise and strong competitive drive to serve the customer.

“innovative”意为“创新的”；“expertise”意为“专业知识和技术”。

“in some instances”在某些情况下，引导后面的句子。

[4] However, a number of other items (e.g., frozen food products, some pharmaceuticals, photographic paper and film, and furs) require this type of facility.

“however”作副词用时，表示“然而，但是”，可以位于句首、句中和句末：位于句首时，要用逗号与句子其他部分隔开；位于句中时，其前后都要用逗号；位于句末时，其前用逗号分开。例如：

She felt ill. She went to work, however, and tried to concentrate. 她病了，然而她照旧去上班，并且尽力集中精神工作。

[5] Ordinarily each of these warehouses handles one kind of product and offers special services specific to that product.

ordinarily 平常地；通常地；一般地

例如：

Ordinarily it would be fun to be taken to fabulous restaurants. 一般来说，跟别人去豪华餐馆吃饭会是件乐事。

[6] Goods such as imported tobacco and alcoholic beverages are stored in this type of warehouse, although the government retains control of the goods until they are distributed to the market place.

“retains”意为“保持”；“distributed”意为“分销的”。

“although”比较正式，语气强，其引导的从句放在主句前后均可，有时还可放在句中。例如：

Although he was tired,he went on working. 虽然他很累，但是他坚持工作。

Although many difficulties are still ahead, we are determined to make greater achievements. 尽管在前面的道路上还有许多困难，但是，我们决心要取得更大的成就。

“although”不能指假设的情况，不能作并列连词，也不能作副词放在词尾。

【Exercises to Text A】



【参考答案】

Ⅰ. Choose the best answer.

1. The most important facility used in warehousing is(　　).

A. warehouse　　B. storage

C. conveyor　　D. carousel

2. (　　) are more flexible because the enterprises have authority over all the activities in the warehouse.

A. Private warehouses

B. Public warehouses

C. Contract warehouses

D. All of the above

3. A bonded warehouse is a (　　).

A. private warehouse　　　　B. public warehouse

C. contract warehouse　　　　D. none of the above

4. (　　)can provide unique and specially tailored warehousing services to the customers.

A. Private warehouses

B. Public warehouses

C. Contract warehouses

D. All of the above

Ⅱ. Translation.

Job title（岗位）：Foreman（仓库主管）
Department（部门）：Warehouse（仓库）

Responsibilities
1. Arrange the warehouse daily work and control the process to assure the production going well.
2. Audit and revise the work procedure and management system and keep improving.
3. Hold business training and assessment for members to improve the workers' quality and efficiency.
4. In charge of warehouse HR plan and management and distribute reasonable HR.
5. In charge of all the equipment's maintenance.
6. Supervise and check warehouse 6S.
7. Assure the warehouse target consistent with company development strategy.
8. Be responsible for warehouse safety production and fire protection.

Requirements
1. More than 4-year experience in the warehouse of large enterprises, more than 2-year warehouse foreman experience.
2. Graduated from high school or above.
3. Familiar with Microsoft office.
4. Familiar with internal delivery procedure.
5. Strong communication ability and have spirit as team.
6. Open-minded, creative.
7. Careful and active to the work and strong sense of safety production.

Ⅲ. Reading and answering questions.

Lately, the question running through my mind has been, "What's in your supply chain?"

In just the past few months, toy companies have had to recall products made overseas because their suppliers used lead paint, which can be very harmful to children. Pet food manufacturers have

had to recall products after dogs died, because an overseas supplier used a harmful chemical in the food. Then, last week came reports that people in the United States and Germany were getting ill from heparin, possibly because of tainted supplies coming from China. And General Mills, Nestlé and ConAgra Foods had to ask supermarkets to remove some of their products affected by the recall of meat from the Westland/Hallmark Meat Packing Co. in Chino, Calif.

These unfortunate incidents underscore the challenges companies face in an increasingly integrated global supply chain. Wal-Mart and other retailers are being sued over the dog food poisonings, even though they were not the parties at fault — rather, an importer had reportedly changed the labels to hide the fact that potentially harmful ingredients had been used.

Companies are going to increasingly demand more information from their suppliers to protect themselves from lawsuits, their brands from negative publicity, and the public from harm. And if they don't, governments will demand more information from them. The U.S. Senate passed a tough measure last week that will require a higher number of inspections of toys by the Consumer Products Safety Commission.

We are moving inexorably toward a world where everything in the supply chain is being more closely tracked. Radio frequency identification is going to be a greater part of that over time, but 2D bar codes can also be employed to capture serialized information about parts and materials that are going into products.



Clearly, we're going to see a rapid rise in the adoption of automatic identification technologies over the next decade. These technologies could provide information on what suppliers are doing and what's going into their supplies, as well as reduce counterfeiting. But auto-ID technologies can only help if the data collected can be turned into actionable information and shared with business partners.

That's why I'm such a strong believer in standards — and not just within the RFID industry. I believe we need to develop standards that will enable any data collected automatically — whether by a passive RFID, active real-time location, 2D bar code, ZigBee or Wi-Fi system — to be employed across supply chains, across borders and among trading partners.

That shouldn't be that difficult to achieve. If data can be output from these systems in a format compliant with EPCglobal's EPC Information Services standard, companies can use the data and software can create new applications, or modify existing applications to take advantage of all the data captured. That's what we should be working toward, because it's the only way you'll ever know what's in your supply chain.

Questions:

1. According to the passage, (　　) is being sued over dog food poisoning.

   A. General Mills　　　　B. Nestle

   C. ConAgra Foods　　　　D. Wal-Mart

2. Companies have to recall products made overseas because (　　).

   A. suppliers used harmful ingredients in the products

   B. their products are of low quality

   C. they want to protect their business information

   D. they want to change the labels on the products

3. Companies are going to demand more information from their suppliers to (　　).

A. protect themselves from lawsuits

B. protect their brands from negative publicity

C. protect the public from harm

D. all of the above

4. The adoption of automatic identification technologies can (　　).

A. provide information about parts and materials that are going into products

B. develop standards that will enable any data collected automatically

C. create new applications, or modify existing applications to all the products

D. help to remove harmful ingredients from the supply chain

5. The main idea of the passage is that companies need to (　　).

A. keep track on parts and materials used in their products

B. recall their products which used poisoning materials

C. demand more information from their suppliers

D. collect data across supply chains and among their suppliers



Text B　Warehouse Equipment



【参考视频】

Modern warehouses employ a wide range of handling equipment. The type of equipment most used is **forklift trucks**, walking-rider **pallet trucks**, **towlines**, **tractor-trailer devices**, **conveyors** and so on.[1] They are described as following.

1. Forklift trucks

Forklift trucks can move loads of **master cartons** both horizontally and vertically. A pallet or slip sheet forms a platform upon which master cartons are stacked. A slip sheet consists of a thin sheet of material such as **solid fiber** or **corrugated paper**. **Slip sheets** are an inexpensive alternative to pallets and are ideal for situations which product is handled only a few times. A forklift truck normally transports a maximum of two unit loads (two pallets) at a time. However, forklifts are not limited to unit-load handling. Skids or boxes may also be transported depending on the nature of the product.



Many types of forklift trucks are available, high-stacking trucks capable of up to 40 feet of vertical movement, pallet less side-clamp versions, and trucks capable of operating in aisles as 56 inches can be found in logistical warehouses.[2] Particular attention to narrow-aisle trucks has increased in recent years, as warehouses seek to increase **rack storage density** and overall storage capacity. The forklift truck is not economical for long-distance

horizontal movement because of the high ratio of labor per unit of transfer. Therefore, forklift trucks are most effectively utilized in shipping and receiving, and to place merchandise in high cube storage. The two most common power sources for forklifts are propane gas and electricity.

2. Walking-rider pallet trucks



Walking-rider pallet trucks provide a low-cost, effective method material-handling utility. Typical applications include loading and unloading, **order selection** and **accumulation**, and **shuttling** loads over longer transportation distances throughout the warehouse. Electricity is the typical power source.

3. Towlines

Towlines consist of either in-floor or overhead-mounted drag devices.[3] They are utilized in combination with four-wheel trailers on a continuous power basis. The main advantage of a towline is continuous movement. However, such handling devices do not have the flexibility of forklift. The most common application of towlines is for order selection within the warehouse. Order selectors place merchandise on a four-wheel trailer, which is then towed to the shipping dock.[4] A number of automated **decoupling** devices have been perfected that route trailers from the main line to selected shipping docks.

A point of debate involves the relative merits of in-floor and overhead towline installation. In-floor installation is costly to modify and difficult to maintain from a housekeeping viewpoint. Overhead installation is more flexible, but unless the warehouse floor is absolutely level, the line may jerk the front wheels of the trailers off the ground and risk product damage.[5]

4. Tow tractor with trailers

A tow tractor with trailer consists of a driver-guided power unit towing a number of individual four-wheel “trailers” that hold several palletized loads. The typical size of the trailers is 4 by 8 feet. The tow tractor with trailer, like the towline, is typically used to support order selection. The main advantage of tow tractor with trailers is flexibility. It is not as economical as the towline because of requires greater labor participation and is often idle. Considerable advancements have been made in **automated-guided vehicle systems** (AGVS).

5. Conveyors

Conveyors are used widely in shipping and receiving operations and form the basic handling device for a number of order selection systems. Conveyors are classified according to power, gravity, roller or belt movement. In power systems, the conveyor uses a drive chain from either above or below. Considerable conveyor flexibility is **sacrificed** in such power **configuration** installations. Gravity and roller or belt systems permit the basic installation to be modified with minimum difficulty. **Portable gravity-style** roller conveyors are often used at the warehouse for loading and unloading and, in some cases, are transported on **over-the-road trailers** to assist in unloading at the destination.[6]



【Key Words】

forklift trucks		叉车
pallet trucks		平板卡车
towline [ˈtəʊlain]	*n.*	拖绳
tractor-trailer devices		牵引式挂车运输设备
conveyor [kənˈveiə]	*n.*	输送机
master cartons		硬纸板箱
solid fiber		致密纤维板
corrugated paper		瓦楞纸
slip sheets		薄衬纸
rack storage density		货架存储密度
order selection		订单拣选
accumulation [əˌkjuːmjuˈleiʃən]	*n.*	积聚，累积，积聚物，堆放
shuttling [ˈʃʌtliŋ]	*vt.& vi.*	使……穿梭移动，往返运送
decoupling [diˈkʌpliŋ]	*n.*	去耦合装置
automated-guided vehicle systems		自动导引小车系统
sacrificed [ˈsækrifaisd]	*vt.*	牺牲，献出
configuration [kənˌfigjuˈreiʃən]	*n.*	结构，布局，形态
portable [ˈpɔːtəbl]	*adj.*	轻便的，手提式的，便携的
gravity-style		重力式
over-the-road trailers		运行在公路上的拖车

【Notes to Text B】


【参考翻译】

[1] The type of equipment most used is forklift trucks, walking-rider pallet trucks, towlines, tractor-trailer devices, conveyors and so on.

当使用“such as”时，一般已理解接下来的会是一些不完整的列举，因此不需加上“and so on”或“etc.”等。

“such as”是举例，后面加举的例子；“and so on”用在举的例子最后，表示“等等”的意思。

[2] Many types of forklift trucks are available, high-stacking trucks capable of up to 40 feet of vertical movement, pallet less side-clamp versions, and trucks capable of operating in aisles as 56 inches can be found in logistical warehouses.

"be capable of" 是固定搭配，表示"有……的能力"，其他介词不与"capable"搭配。

less side-clamp versions　少侧钳位

[3] Towlines consist of either in-floor or overhead-mounted drag devices.

"in-floor" 意为"安装在地面的"；"overhead-mounted" 意为"安装在空中的"。

consist of　包括；由……组成；由……组成

例如：

They consist of using (usually commercial) tools to automate workflows and manage the products of IT processes. 他们包括了使用（经常是商业）工具以实现自动化的工作流，并管理 IT 过程的产品。

[4] Order selectors place merchandise on a four-wheel trailer, which is then towed to the shipping dock.

place on　把……放在……上；把…强加于……；重视；着眼于

例如：

In conclusion, we must take into account this problem rationally and place more emphases on peasants 'lives. 总之，我们应理智考虑这一问题，重视农民的生活。

[5] Overhead installation is more flexible, but unless the warehouse floor is absolutely level, the line may jerk the front wheels of the trailers off the ground and risk product damage.

but unless　全部，但除非

例如：

The practical and procedural politics of the UN is trickier, but unless the last-minute negotiations deliver something dramatic. 联合国务实而又程序化的政治程序更加复杂烦琐，但是除非和谈在最后一分钟出现戏剧化的转折。

[6] Portable gravity-style roller conveyors are often used at the warehouse for loading and unloading and, in some cases, are transported on over-the-road trailers to assist in unloading at the destination.

in some cases　在某些情况下

例如：

In some cases the slag can be disposed of usefully. 有时炉渣能有用处。

In some cases, depending on user workflows, tabbed panes can be appropriate. 在某些情况下，根据我们的工作流程，可以使用标签窗格。

This may fail in some cases. 在某些情况下这样可能会失败。

【Exercises to Text B】

Ⅰ. True or false.

1. Warehouse can be classified into private warehouse, public warehouse and contract warehouse. (　　)



【参考视频】

2. Private warehouses are operated by the carriers. ( )

3. Manufacturing firms also utilize public warehouses. ( )

4. When using public warehousing service, it is hard for a firm to change the location and size of inventory. ( )

5. Contract warehouse operators can offer other value-adding activities such as order processing, product inspection. ( )

Ⅱ. Fill in the blanks.

store	unique	warehousing	WMS
handle	employ	facility	primarily

1. For many years, enterprises had two choices with respect to __________ —public and private.

2. Principal warehousing activities include receipt of products, __________, shipment, and order picking.

3. Private warehouses are usually designed to __________ a variety of items, while private warehouses are more specialized.

4. Most firms depend on a __________ to standardize work procedures and encourage best practice.

5. Every user of warehousing __________ wants it to operate with highest efficiency.

6. Contract warehouse can provide __________ and specially tailored warehousing services.

7. Warehouse emphasizes the storage of product and their __________ purpose is to maximize usage of available storage space.

8. Modern warehouses __________ a wide range of handling equipment.

Ⅲ. Reading and answering questions.

Increased demand for metal from the Far East, together with speculative investment in base metals by financial investors, has led to record international lead and copper prices, with the prices of others such as aluminum, nickel and zinc following suit. These increased prices have resulted in more incidents of metal theft in the UK.

Spurred on by potentially large rewards, thieves are becoming increasingly bold and their targets more unusual. Many of the thefts are carried out in broad daylight with thieves posing as innocent workmen. Lead, copper and stainless steel roof coverings, iron gates, bronze statues, lead and copper rainwater pipes and even brass door knobs have all been stolen in recent months.

Wherever metals are present, there is an increased risk of theft. Even a small loss can have a significant impact on your business as it takes time to repair damage and source replacement stock or equipment. Further, a business insurance policy does not usually cover as standard theft of either property in the open or of parts of the building.

As long as the value of scrap metal is inflated, metal theft will continue to be a high risk. We therefore recommend that you re-evaluate your premises' existing security arrangements.

There are a number of measures that you can take to deter metal thieves, including:

(1) Remove any easy access to building roofs e.g. water butts, waste bins and trees. Cut back tall trees and vegetation that could provide a screen for criminal activities. Remember to get the necessary approval for any tree cutting before work starts.

(2) Store ladders and any easy means of transporting stolen goods (e.g. , wheelie bins and wheelbarrows) in a secure place.

(3) Check roofs regularly. Theft of roofing materials can let rainwater into the building, causing further damage.

(4) Improve the physical security of your premises. Be sure to agree in advance any changes to your intruder alarm protection with your insurer.

(5) If you have stocks of metals, review the existing security arrangements. Many businesses take measures to protect their computer equipment against theft but overlook protection for metals in the workshop or stockyard.

(6) Review perimeter security. Keep any gates locked and restrict vehicular access to the site. Consider retractable bollards over the gated entrance for use out of working hours.

(7) Consider installing security lighting around the building and site, particularly at roof level if there is a metal roof covering.

(8) Consider installing CCTV and display prominent warning notices around the site.

Questions:

1. ( ) has caused the increase in metal price.

   A. Increased demand for metals

   B. Increased incidents of metal theft

   C. Decreased means of transporting metals

   D. Deceased investment in metals

2. Prices of ( ) have been increasing.

   A. lead and copper B. aluminum C. nickel and zinc D. all of the above

3. The word “spurred” in Para. 2 means ( ).

   A. stimulated B. discouraged C. prevented D. improved

4. Which of the following is not true according to the passage? ( )

   A. Re-evaluating existing security arrangements can help to prevent metal thieves.

   B. Many thieves pose as innocent workmen and steal metals in broad daylight.

   C. Business insurance policy usually covers loss of metal parts of buildings.

   D. Increased prices of metals caused more incidents of metal theft in the UK.

5. Measures to prevent metal theft include the following except ( ).

   A. Cutting back tall trees and vegetation around the stockyard.

   B. Storing ladders and wheelbarrows in a secure place.

   C. Taking measures to protect information on metal stocks.

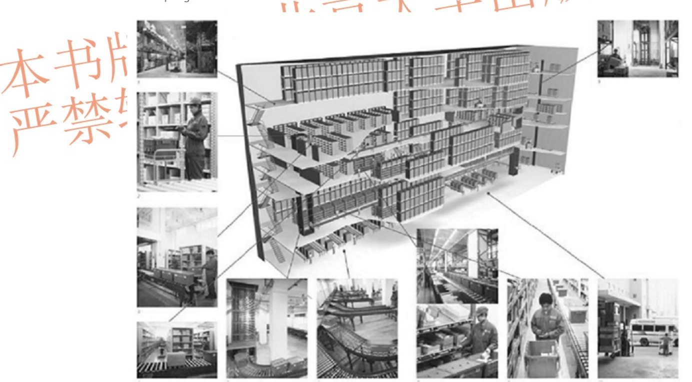
   D. Restricting vehicular access to the stockyard.



Reading Material A

Web Firms Go on Warehouse Building Boom

The Internet's top retailers aren't **sneering** at giant warehouse anymore—they are building them. This wasn't supposed to happen. Much of the early excitement about **electronic commerce** (e-commerce) involved the belief that companies could serve millions of customers without needing anything approaching the **infrastructure** of a Sears or Wal-Mart. E-commerce companies were supposed to be incredibly efficient **clusters** of computer programmers, who used outside subcontractors to handle such dreary tasks as keeping inventory, filling orders and handling customer-service issues. But now online merchants are discovering that if they don't control their own warehouse and shipping, their reliability ratings with customers can turn dismal. Amazon.com, for example, is in the midst of a US $300 million distribution center initiative that involves building giant facilities in Nevada, Kentucky and Kansas to handle its inventory of books, music, toys and electronics. An online grocery retailer, Webvan Group Inc. has placed a US $1 billion order with Bechtel Group for giant warehouse in 26 cities across the US. And other **electronic merchants** such as eToys Inc.and Barnesandnoble.com are pushing ahead with big warehouse projects as well.



Such investments may be essential if e-commerce companies hope to build up a base of loyal customers, says Steve Johnson, co-director of the e-commerce program at Anderson Consulting. "Customer **acquisition** costs are quite high for these companies, and the only way to get a **pay off** is if you get a lot of repeat business from people," he says, "One bad experience and you have blown it forever." But Internet companies face a steep learning curve as they try to

master the shipping and warehouse business. Books and compact disks can be shunted through a warehouse without much trouble, but bulky, odd-size items such as toys and electronics are a lot more difficult. Also, customer return rates can be as high as 30 percent in categories such as apparel, posing big challenges in handling such merchandise. What's more, the make-it-up-as-we-go-along culture of many Internet companies may mesh badly with the logistics industry's need for careful, precise planning. In a recent interview, Webvan's chief executive officer, Lewis Borders, said: "You would laugh at some of our design errors." Heavy equipment targeted for a corner of Webvan's Oakland, California warehouse site had to be relocated after it was discovered that poor soil couldn't support the load, he said.

Some e-commerce companies delegate warehousing and shipping to specialists in that area. But some of the most ambitious internet retailers argue that, for all the additional headaches, it is still worth going into these logistics businesses themselves. "The closer we are to the customers, the more we can build up the lifetime value of our relationships with them," says Jonathan Bulkeley, CEO of Barnesandnoble.com. To oversee these facilities, e-commerce companies are recruiting executives who have plenty of experience in the heavy-lifting end of the business. With some effort, the Internet and logistics cultures are trying to blend together.

【Key Words】

sneer at		嘲笑，讥笑
electronic commerce		电子商务（简写为 e-commerce）
infrastructure [ˈinfrəstrʌktʃə(r)]	*n.*	基础设施；基础建设
clusters [ˈklʌstə(r)]	*n.*	群；丛；簇，串
	vi.	丛生；群聚
	vt.	使密集，使聚集
electronic merchant		电子商人
acquisition [ˌækwiˈziʃn]	*n.*	收购，获得；购置物，获得物
pay off		付清；（付清工资后）解雇

【Questions】

1. Warehouse building are so popular with retailers. Why?
2. How about electronic merchants?
3. What about delegation in that area?



Reading Material B

Cross-docking

1. Cross-docks are high speed warehouses

If an arriving item has already been requested by a customer, there is no need to store it as anticipation inventory; instead, the item can move directly from receiving to shipping, without

intermediate storage and retrieval. Thus the item can move much more quickly through the facility and the most costly part of warehouse labor can be avoided.

In a high-volume cross-dock the turnover times may be measured in hours. To support this velocity of movement, a cross-dock may be nothing more than a slab of concrete with a roof and walls punctuated with doors for trailers. Freight is pulled off arriving trailers, sorted and loaded onto departing trailers without intermediate storage.

There is little or no storage provided in a cross-dock because items do not stay long enough; but there is generally a lot of material-handling equipment, such as forklifts and pallet jacks, to move freight. Labor is frequently the main cost and it is devoted to unloading incoming trailers, moving the freight to the appropriate outgoing trailers, and loading. Consequently, the issues within a cross-dock are those of material-handling and product flow rather than location and retrieval.

2. Why Cross-docking is becoming popular among retailers?

Because of its impact on costs and customer service, cross-docking is becoming popular, especially among retailers. For example, approximately 75 percent of food distribution involves the cross-docking of products from supplier to retail food stores. The biggest impact of a cross-dock is on reducing transportation costs. This can be achieved by consolidating multiple shipments so that full truck loads can be sent.

The Home Depot is a major retailer and the largest user of Less-than-Truck-Load (LTL) shipping in North America. Nowadays, LTL costs about twice the cost of Truck-Load (TL) shipping, so there is a strong incentive to fill trailers.

The Home Depot has begun doing this by having vendors ship full trailers to its cross-dock (the trailers are full because they hold product for many stores). At the cross-dock the product is sorted out for individual stores and consolidated with product from other vendors bound for the same store. The result is that each store has enough freight that it or it and a few close neighbors generate a full truck load from the cross-dock. The result can be considerable savings.

Additional benefits include less inventory (because all product flows right through) and less labor (because product does not have to be put away and later retrieved).

【Key Words】

cross-dock		交叉码头；交叉转运；交叉货仓
anticipation inventory		预期库存
high-volume [ˈhaivˈvɒljuːm]	*adj.*	大量的
punctuate [ˈpʌŋktʃueit]	*vt.*	加标点符号；不时打断；加强，强调
retrieval [riˈtriːvl]	*n.*	检索；收回，挽回
full truck loads		全车荷载
Less-than-Truck-Load		拼车运输
Truck-Load		整车运输

【Questions】

Why cross-docking is becoming popular among retailers?

参考译文

第5章 仓库管理

案例分析

公共保税仓库

近日，一个公共保税仓库在义乌国际物流中心B区（二期）设立，这是义乌市设立的首家公共保税仓库。该保税仓库面积达5 184平方米，配套装卸场地达650.5平方米。该仓库专门存放保税货物及其他尚未办结海关手续的货物，主要包括与物料出口货物、用户提供的出口货物进口材料、出口临时延误的后再货物。此外，它也处理其他业务，包括批寄售业务、快速转换和展览保税货物。

Text A

仓储的种类

1．仓储概述

仓储是物流系统中必不可少的部分。全球约有750 000个仓库设施，包括专业管理的仓库和企业的储藏室、车库甚至庭院货棚。当企业决定储存产品时，它有两种仓储可以选择：租用仓储设施（公共仓储）或是自建仓储设备（自有仓储）。

企业在选择两种仓库类型时必须仔细进行考查。例如，公共仓库的价格有可能会比较高，因为它要在获取一定的利润的基础上运营，它可能也有销售和广告成本。然而，企业不需要在仓储设备上进行初始投资。对于客户服务而言，自有仓储一般能提供更高水平的服务，因为它拥有更专业化的设施和设备，而且它更熟悉公司的产品、客户和市场。在某些情况下，创新型公共仓库因为专业性和强大的竞争驱动力，能够向客户提供更高水平的服务。

下面我们将讨论公共仓储。

2．公共仓库

公共仓库有很多种，包括：

（1）为制成品准备的普通商品仓库。

（2）冷藏仓库。

（3）保税仓库。

（4）特殊商品仓库。

（5）大宗散货储藏仓库。

3．普通商品仓库

普通商品仓库是最普遍的形式。它被用来为制造商、分销商和客户储存几乎任何品种的产品。

4．冷藏仓库

冷藏仓库或冷冻仓库提供了一个温度可控的储藏环境。它通常用于水果和蔬菜等易腐品的保鲜。不过，很多其他物品（例如，冷冻食品、一些药物、相纸、胶卷和皮毛）也需要这类设施。

5．特殊商品仓库

特殊商品仓库用于储存特定的农产品，如谷物、羊毛和棉花。通常来说，这类仓库每家分别处理一种特定的产品，并为该种产品提供特殊服务。

6．保税仓库

有些普通商品仓库和特种商品仓库被称为保税仓库。诸如进口烟酒等商品储存在这类仓库里，这些货物在分销到市场前一直受政府控制。保税仓库的优势在于，这些商品销售后再支付进口关税，故而进口商手头就有资金来支付那些费用。

7．大宗散货仓库

大宗散货仓库为液体货物提供罐式仓储，为煤、沙和化学品等干货提供开放式或棚架式仓储。

Text B

储存设备

现代化仓储需要使用多种搬运设备。最常见的设备有叉车、平板拖车、缆车、拖车、输送机及传送设备等。下面进行详细介绍。

1．叉车

叉车可以水平和垂直地运输硬纸板箱货物。托盘或平板可以作为堆放纸箱的平台。平板是由牢固的纤维和瓦楞纸这些薄片材料做成的。它是一种廉价的托盘代替品，也是在货物只需少次搬运的情况下的理想选择。叉车通常一次最多可运输两单位的货物（两个托盘）。然而，叉车并不局限于成组货物的搬运。它也可以根据产品的特点，搬运平台或箱子。

叉车有多种可供选择，如可以垂直向上移动达 40 英尺的高摞叉车、搬运没有包围加固的托盘叉车，以及可以在 56 英寸走廊上操作的叉车。以上种类的叉车都可以在物流仓库中看到。但需要特别注意的是，近些年适用于狭窄通道的叉车不断出现，因为仓库需要增加行架的密度和总储存容量。由于每次运输的劳动力比例较高，所以对于长距离的水平搬运来说，使用叉车并不是一种经济的方法。因此，叉车仅能有效地用于装卸搬运及货物的堆高。叉车通常使用天然气和电两种能源。

2．平板拖车

平板拖车是一种低成本、高效率的搬运设备。它主要用于装卸货、拣选和堆放货物，也可以在仓库内进行长距离的货物搬运。它们一般都用电力驱动。

3．缆车

缆车可分为轨道式和悬挂式。它们主要与四轮货箱结合使用。缆车的主要优势就是可以连续运行，但没有叉车那样灵活，通常用于在仓库中的拣选作业。订单拣选人员将货物放在四轮货箱内，然后四轮货箱被拉到装卸台。从拣选线到装卸平台安装有许多自动引导装置。

轨道式和悬挂式缆车各有其优/缺点。从仓库管理者角度来看，轨道式缆车改进的成本较高，保养较难。而悬挂式缆车更灵活，除非仓库地板绝对水平，否则绳索会使拖车的前轮离地形成冲击而造成货物损坏。

4．带有挂车的拖车

这种车由驾驶员操作的动力车和装有托盘货物的四轮“挂车”所组成。这种拖车的标准尺寸是 4 英尺×8 英尺。这种拖车和缆车一样，主要用于拣选，其主要优点就是灵活性好。

因为它所需的劳动力较多且经常闲置，所以不如拖缆车经济。自动导引车（即 AGV 小车）系统已在这方面有了很大的改进。

5．输送机

输送机广泛应用于装、卸货，它也是许多拣选系统的基本设备。输送机可分为动力式、重力式、滚柱式和带式。在动力式系统中，输送机上、下都可安装驱动链。在动力结构中，输送机的灵活性将会减弱。重力和滚柱或皮带输送系统可以进行部分的改装以增加灵活性。可移动重力式、滚柱式输送链常用于仓库中的装卸，它们有时候也由拖车运送到目的地，帮助卸货。

阅读材料 A

网络公司使仓库发展突飞猛进

著名的网络零售商已不再嘲笑庞大的仓储空间——相反，他们也在建造大型仓库。这种事情以往是想不到的。对电子商务，人们早先表现得有点过分兴奋，以为电子商务公司无须建造像 Sears 或 Wal-Mart 那样的地面基础设施，就可为数百位顾客提供服务；以为电子商务公司只需聚集一大批工作效率惊人的计算机编程员就行，因为这些编程员可以雇用外部承包商，让他们来处理商品库存、采购及售后服务之类的苦差事。可是现在，网络商家开始认识到，假使自己不能控制自己的商品库存运送业务的话，顾客对其信任度就会下降。例如，亚马逊网目前就正在考虑投资 3 亿美元，在内华达、肯塔基和堪萨斯州建造大型配送中心及相关设施，以便管理自己的图书、音像制品、玩具和电子产品。Webvan 集团公司是一家日杂商品网上销售公司，它已经和 Becheel 工程建筑项目管理公司签订了一份 10 亿美元的订单，委托该公司为自己在美国的 26 个城市建造大型仓库。其他电子产品销售商，如 e Toys 公司和 Barnesand noble 图书公司也都在兴建大型仓储项目。

Anderson 咨询公司电子商务部的副主任斯蒂夫 • 约翰逊说，类似投资对电子商务公司来说是必要的，只有这样，才能赢得大批忠实顾客。“对这些公司来说，赢得顾客所花的成本是很高的，要赢利的话，你就必须要有大批回头客，”他说，“只要顾客有了一次不愉快的经验，你的生意就永远的砸了。”但网络公司在试图掌控货运和仓储业务的同时，要学习的东西实在是多。将图书和光盘运进仓库并不麻烦，但像玩具、电子产品这些体积大，而且尺寸也各异的东西，就要困难得多。而且，诸如服装之类的商品，顾客退货率可高达 30%，处理好这类商品是颇为棘手的事情。再说，许多网络公司的那种“临时抱佛脚”的经营方式与物流业细致、精确度计划的要求也不一致。Webvan 公司总裁刘易斯 • 鲍德斯最近在被采访时说：“我们在计划方面所犯的一些错误，说出来是会让人笑掉大牙的。”他说，笨重的机械设备运到加利福尼亚州奥克兰 Webvan 公司仓库一角后，结果发现地面土壤太松软，承受不起。

有些电子商务公司将仓储和运输业务派给所在地区的专营商。但是，有些进取心强的网络零售商认为，尽管麻烦挺多，但是自主经营相关物流业务还是值得的。“与客户的距离越近，越容易建立与客户间的长期关系，其价值也就越大，”Barnesand noble 的总裁乔纳森 • 布尔克利说。网络公司为了管理相关事务，正招聘在运送笨重物品方面有经验的管理人员。网络与物流正面临着一个如何努力携手、共进双赢的局面。

阅读材料 B

越 库 配 送

1．直接换装成就高速仓库

如果送达的货物已被顾客订购，就没有必要将它当作预期库存储存起来；相反，该货物可以直接从收货区移到发货区，不需要中间的储存阶段和取货阶段。因此，物品在设施里可以更快地移动，而且可以避免仓储劳动中成本最大部分。

在大量的直接换装中，周转次数可以用小时来衡量。为了支持周转速度，直接换装库可以仅仅是供拖车活动用的带有屋顶和墙的水泥板。货物从到达的拖车上卸下、分类并装载到出货拖车上，并不需要中间储存。

在直接换装中很少提供、甚至不提供存储，是因为商品不会停留太久；但是一般会有许多物料搬运设备来搬运货物，比如叉车和托盘千斤顶。人力经常是最主要的成本，用于卸载进货拖车，并将货物搬装载到合适的出库拖车上。因此，在直接换装中，需要做的是物料搬运和商品流动，而不是物品的放置和取货。

2．为什么直接换装在零售业中越来越普遍？

由于对成本及客户服务的影响，直接换装越来越普遍，特别是在零售商中。例如，大约75%的食品配送都涉及商品从供应商到食品零售店的直接换装。直接换装最大的影响就是降低了运输成本。这可以通过出货拼组实现整车送货，从而达到目的。

Home Depot 是北美主要的零售商和最大的拼车运输（LTL）客户。如今，拼车运输成本大约是整车运输（TL）的两倍，从而强烈刺激了拖车的满装。

为此，Home Depot 让供应商将满拖车货物装运到它的直接换装库（拖车是满的，因为它们为很多商店运输商品）。在直接换装库中，一般将产品根据下游商店进行分类，将其他供应商提供的产品拼组后运送给同一家商店。其结果是，每家商店自己或者与邻近商店都有足够的货物，从直接换装库中采购整车货。这样可以节省相当可观的成本。

直接换装另外的一个好处就是降低库存(因为所有产品都立即发货)，以及减少劳动力(因为不需要对产品进行回收)。



Chapter 6

Packaging Management



Case Study

IKEA Changed the Packaging of Tea Candle

IKEA was founded in 1943. It has been recognized as one of the world's best retailers in terms of sales volume, growth, number of stores and number of countries. The company has also been recognized as viewing packaging and logistics as important factors for success.

At IKEA stores the customers select their products directly from the stock that is displayed in the store or immediately receive it from the store warehouse and take it home, where they carry out the final **assembly operation**. IKEA has total control over the supply chain from the supplier to the **end-customer**. Today, there are more than 200 IKEA stores in 31 countries and the range of products is almost the same in every country. The main market is Europe(82%), followed by North America(15%) and Asia(3%). In the beginning IKEA primarily worked with furniture, but now the availability of accessories and **ancillary** products are just as important. This broadened product range has resulted in a number of different packaging solutions, where IKEA had to leave their original "flat package, home assembly" concept.





IKEA's distribution and the packaging solution have from the beginning been set for the European distribution on Euro pallets. This has become a limiting factor as the market has become more global. IKEA decided that the packaging issues had to be addressed. A packaging support function was set up in 1999, called the Packaging Concept. The idea was that the packaging technicians should be located closer to the products and the product development process. This meant that new systems were developed to fulfill IKEA's different needs.

There has been a continuous search in IKEA to reduce the amount of empty space in packaging and vehicles. In 2002 it was found that GLIMMA (the IKEA product name containing a package with tea candles) had more air than any other package. As the GLIMMA product was a

massive sale success, it was obvious that a change in packaging would be very beneficial.

The original consumer package held 100 candles in a plastic bag, see Figure 6.1. The bags were packed in large cardboard containers placed on full-size pallets (1,200mm×800mm), offering a display function. The plastic bag was difficult to handle. The floor space utilisation and display functions were not good.



Figure 6.1 New packaging solution to the left, old plastic bag to the right

In November 2002, a project was initiated to improve the product, packaging and distribution. The staff chosen had received internal IKEA education and reported directly to the managing director of the IKEA packaging department, who was working with universities to develop the packaging aspects. They formed a team together with the product development people and the suppliers of the candles. The objective was to make the space wasting bags more effective in all parts of the supply chain from supplier to store. In February 2003, they had identified a solution for the total supply chain which was expected to fulfill all the technical properties of the tea candles. In July 2003, four pallets of the **prototype** solution arrived from the supplier in China.

A European pallet in the new German system holds now 360 packs, each holding 100 tea candles, instead of the original 252 packs of 100 candles on the pallet. That reduced the number of Euro-pallets used from 59,524 to 41,667 pallets. This reduction lowered the number of trucks needed for the distribution from warehouse to store by 200 trucks each year. It resulted also in lower costs and less environmental impact. It actually produced 21% less CO_2 emissions from **fossil fuel** used in the vehicle journeys each year. The new packaging solution also required less packaging materials in bags and cardboard boxes. These savings meant that it was possible to increase the profit margin, as the price for 100 tea candles is the same as before.

Time has also been saved in the store. The new packaging solution result in easier handling, faster unpacking and better display opportunities. As one pallet takes five minutes to unpack in the store, IKEA calculates with a saving of 186 working days each year in the stores.

Outline

The new solution also promotes the commercial requirements better than before, as less cardboard is visible and less floor space is required per 100-pack. This results in more available space for other products to be displayed and sold in the stores.

【Key Words】

assembly operation		装配作业
end-customer		终端客户
ancillary [æn'siləri]	*adj.*	辅助的；补充的
	n.	助手，随从
prototype ['prəutətaip]	*n.*	原型，雏形，蓝本
fossil fuel	*n.*	化石燃料

Text A　The Importance of Packaging in Logistics





【参考视频】

Packing interacts with the logistics system in a number of different and important ways. The size of and protection afforded by the package affect the type of materials-handling equipment used and the level of product damage incurred. The package has an impact on the **stacking** height of the product in the warehouse and thereby on the utilization and cost of the warehouse.[1] Also, from a logistics manager's point of view, packaging is quite important for effective damage protection, not only in the warehouse but also during transportation. Packaging may contribute nothing to a product's value, but its influence on logistics costs is considerable.

Package size may affect a company's ability to use **pallets** or shelving or different types of materials-handling equipment. Many companies design packages that are too wide or too high for efficient use of either a warehouse or transportation carrier. So, coordinating packaging with warehousing and with transportation is quite important. Also, poor packaging can contribute to higher handling costs and result in lower future sales if the goods arrived damaged.



Although packaging is important to logistics and supply chain management, it

is also of great importance to other functional areas of the company. Like materials handling, packaging connotes different things to different people. Since packaging involves a number of organizational areas, these functional entities will need to coordinate their packaging concerns.

Information provision is also important to logistics people. Goods stored in a warehouse must bear the proper **identification** so that warehouse personnel can locate them easily and correctly.[2] When designing a package, firms may spend a lot of time and effort making sure that it provides information to warehouse personnel. Companies can use **color codes** for placing goods in a ware house. The company should note the weight on the package in order to inform people lifting the package or to determine what can rest on top of it. Techniques for providing information include color coding, universal product codes, **computer-readable tables**, symbols, and **number codes**. A firm's technique or combination of techniques will depend on the organization's particular circumstances.

A major packaging concern is the ease of handling in conjunction with materials handling and transportation. Large packages, for example, may be desirable from a production perspective, but the contents' size and weight might cause problems for materials-handling equipment or for transfer into and out of transportation equipment; so any packaging design should try to maximize **handling ease** in the warehouse and during transportation. Handling ease is also quite important to the production manager, who places the goods in the package.

The important considerations of package design fall into three areas. The first is the package's **physical dimensions**. The design must consider space utilization in terms of the warehouse, transport vehicle, and pallets. The product's physical dimension must also take into account the company's materials-handling equipment. The second consideration is the **package's strength**. The package designer must analyze the package's height, handling, and the type of equipment that will handle the package. The third consideration is package shape.

With customer service playing an ever-increasing role in logistics planning, companies need to integrate their packages with customers' materials-handling equipment.[3] A special package that can interface with a company's innovative equipment may move products inexpensively through its system; however, a customer's **incompatible** equipment will impair its ability to receive and store those goods. In this situation, customer service value may be lost.

A logistics manager's major concern is protecting the goods in the package. In the warehouse, for example, where moving goods could drop from a conveyor or be hit with a forklift truck, the package must provide the product adequate protection. Protection is also important when a transportation agency handles the product. Protection can also mean protecting products from contamination resulting from contact with other goods, water damage, temperature changes, **pilferage**, and shocks in handling and transport. Sometimes packaging must support the weight of products stacked above it, or provide

even weight distribution within the package to facilitate manual and automatic materials handling.[4]

【Key Words】

stack [stæk]	*vt.* & *vi.*	堆积
	n.	堆，垛，大量，一大堆
package size		包装规格
pallet [pælit]	*n.*	扁平工具，托盘，货盘
connote [kənəut]	*vt.*	隐含，暗示，意味着
identification [aiˌdentifeikeiʃn]	*n.*	鉴定，验明，认出；识别标签
color code		色彩代码
computer-readable table		机读表
number code		数字代码
handling ease		搬运的方便性
physical dimension		物理维度
package's strength		包装强度
incompatible [inkəmpætəbl]	*adj.*	合不来的，不兼容；不协调的，不相配的
pilferage [ˈpilfəridʒ]	*n.*	行窃，偷盗；小偷小摸

【Notes to Text A】

【对应翻译】

[1] The package has an impact on the stacking height of the product in the warehouse and thereby on the utilization and cost of the warehouse.

“impact”在此句中是名词，意为“影响，作用”。例如：

The computer had made a great impact on modern life. 计算机对现代生活产生了巨大的影响。

“stacking”是现在分词，作“height”的定语。

[2] Goods stored in a warehouse must bear the proper identification so that warehouse personnel can locate them easily and correctly.

“stored in a warehouse”是过去分词短语作“goods”的后置定语。

“personnel”意为“人员，员工”。例如：

The personnel are not happy to change these rules. 全体工作人员对改变这些规定很不高兴。

[3] With customer service playing an ever-increasing role in logistics planning, companies need to integrate their packages with customers' materials-handling equipment.

“with customer service playing an ever-increasing role in logistics planning”是介宾结构，作状语。

“materials-handling”是“物料搬运”的意思，例如：

The materials-handling equipment selection decision is examined from a design

perspective, as well as from a pragmatic viewpoint of the factors utilized in the selection decision. 物料搬运设备的选择决策不仅要从实用因素注重实效的观点来看，也要从设计的角度来检验。

[4] Sometimes packaging must support the weight of products stacked above it, or provide even weight distribution within the package to facilitate manual and automatic materials handling.

“distribution”意为“散布，分布”。例如：

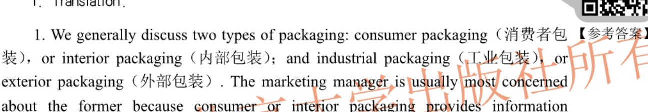
The town council passed a law forbidding the distribution of handbills. 镇议会通过法律，禁止散发传单。

“stacked above it”是过去分词短语作后置定语修饰“products”，相当于从句“which are stacked above it”。

【Exercises to Text A】

【参考答案】

Ⅰ. Translation.



1. We generally discuss two types of packaging: consumer packaging（消费者包装）, or interior packaging（内部包装）; and industrial packaging（工业包装）, or exterior packaging（外部包装）. The marketing manager is usually most concerned about the former because consumer or interior packaging provides information important in selling the product, in motivating the customer to buy the product, or in giving the product maximum visibility when it competes with others on the retail shelf.

2. Hewlett-Packard（惠普公司）ships computer printers from the United States to Europe using airfreight and minimal packaging（精简包装）. They shrink-wrap（收缩包装）unit loads of printers to provide stability and reduce damage. In addition to lowering transportation cost, the overall practice reduces import duties since substantial value-added is postponed until the product is finally assembled and sold in Europe.

3. However, the plastic materials（塑料材料）companies use to cushion the product（衬垫产品）inside the box have possibly done the most to revolutionize packaging. These materials enable manufacturers to highly automate the packaging area and to maximize protection while minimizing costs.

Ⅱ. Fill in the blanks.

1. The size of and protection ________ by the package affect the type of materials-handling equipment used and the level of product damage incurred.

2. Many companies design packages that are too wide or too high for ________ use of either a warehouse or transportation carrier.

3. Since packaging involves a number of organizational areas, these functional entities will need to ________ their packaging concerns.

4. Companies can use ________ for placing goods in a warehouse.

5. The important considerations of package design fall into three areas. The first is the package's ________.

6. Changes in federal and state regulation have also affected packaging's protection aspect, especially in food and drug product areas, where companies must design packaging to reduce consumer anxieties about ________.



Text B Packaging Helps to Optimize Logistics Units

1. Greater efficiency with intelligent consolidation

With the help of packaging, logistics units like the Euro pallet can be created in order to transport products as collective units. Ideally, these units remain intact throughout the delivery chain and do not have to be broken down into their components.[1] The **optimal** situation for a logistics manager would be to pack a number of just-finished goods onto a pallet, load it along with other units onto a tractor-trailer rig and then deliver the entire load to the customer. Loading, transshipping and unloading of logistics units could be easily done by such **auxiliary** devices as forklifts.







【参考视频】





hold can be optimally used. The strength of these containers is that fewer units have to be loaded, generating savings in time, expense and ground personnel.

2) Small containers

Small containers are suited for small parts being stored, picked or transported within a business operation. They have standard sizes and can often be stacked, a feature that enables several small containers to be packed collectively into a logistics unit on pallets.[3] Small containers include plastic containers, cardboard boxes, foldable units, insulated cases and special containers for foods or bulk cargo.

3) Box pallet

The box pallet is a combination of container and pallet. It is based on a pallet and has a **superstructure** of wire mesh, sheet metal or wood. It is used to store an assortment of packaged goods in large quantities or with large volumes.

4) Flat pallet

The best known flat pallet in Europe is the Euro pallet. It is a load-bearer that has been normed by European transport companies. Pallets of 800 mm × 1,200 mm are widely used in Europe. Several other ISO standard sizes have also been defined for pallets. In North America, pallets measuring 48 inches by 40 inches, or 1,219 mm × 1,016 mm, are most often used. As a rule, Euro pallets are not used in ISO containers because the Euro pallet does not fit into the ISO container. The reason for the different sizes lies in the systems' **disparate** origins. The ISO container was developed in the United States, the Euro pallet in Europe.

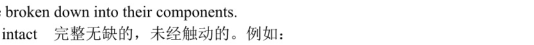
5) Stack pallet

The stack pallet is a flat pallet with four corner columns that facilitate the stacking of pallets on top of one another.[4] The vertical columns on the four corners of the pallet have a standard profile and are either fixed or removable. The external dimensions and the carrying capacity of the stack pallet are roughly those of the box pallet. When several of these structures are stacked vertically, stack pallets can also be used as pallet racks.

【Key Words】

optimal [ˈɔptiməl]	*adj.*	最佳的，最优的；最理想的
auxiliary [ɔːgˈziliəri]	*adj.*	辅助的；备用的，补充的；附加的
	n.	助动词；辅助者，辅助人员
consolidation [kənˌsɔliˈdeiʃən]	*n.*	巩固；联合；合并；变坚固
aptly [ˈæptli]	*adv.*	适当地，适切地，巧妙地
so-called [ˈsəuˈ kɔːld]	*adj.*	所谓的，号称的
interior [inˈtiəriə(r)]	*n.*	内部；内地；内政；内心
	adj.	内部的
cargo hold [ˈkɑːgəu həuld]		货仓
superstructure [ˈsuːpəstrʌktʃə(r)]	*n.*	上部结构，上层建筑；上面部分
disparate [ˈdispərət]	*adj.*	完全不同的；从根本上种类有区分或不同的

【Notes to Text B】





【对应翻译】

[1] Ideally, these units remain intact throughout the delivery chain and do not have to be broken down into their components.

intact　完整无缺的，未经触动的。例如：

He can scarcely survive this scandal with his reputation intact. 他经此丑闻，名誉很难不受损。

break down into　分成不同种类；分解成……。例如：

Physically, the rocks break down into smaller and smaller pieces. 物理上，这些岩石分解成很多越来越小的碎片。

[2] Logistics units result from the consolidation of goods in units of standardized form and dimension.

result from　产生于……，由……引起。例如：

His failure resulted from not working hard enough. 他的失败是工作不够努力造成的。

consolidation　巩固；联合；合并；变坚固。例如：

Even if not total, the Romans' hold was sufficient for them to begin the task of consolidation. 即使没有实现完全的控制，罗马人的势力也足以让他们开始着手巩固政权了。

[3] They have standard sizes and can often be stacked, a feature that enables several small containers to be packed collectively into a logistics unit on pallets.

"a feature" 指的是 "they have standard sizes and can often be stacked"，它们是同位语。

collectively　全体地，共同地。例如：

In 1968 the states collectively spent US $2 billion on it. 1968 年，各州在这上面总共花费了 20 亿美元。

[4] The stack pallet is a flat pallet with four corner columns that facilitate the stacking of pallets on top of one another.

facilitate 促进，使容易；帮助。例如：

The new airport will facilitate the development of tourism. 新机场将促进旅游业的发展。

"with four corner columns"是介词短语，修饰"pallet"；"that facilitate the stacking of pallets on top of one another" 是定语从句，修饰 "columns"。

【Exercises to Text B】



【参考答案】

Ⅰ. Answer the following questions.

1. What is the feature of ideal logistics units?
2. What is the basic idea of "unitization"?
3. How can you streamline the transport chain?
4. What are the 5 primary logistics units?

Ⅱ. Fill in the blanks.

disparate	superstructure	interior	so-called	aptly	consolidation	auxiliary	optimal

1. The ________ flatlands and valleys are thickly planted with coconuts.
2. The state ensures the ________ and growth of the state economy.
3. This word is ________ used here.
4. The ________ systems differ according to the criterion chosen.
5. Chalk and cheese are ________ substances.
6. More and more companies have gone "green" and started producing ________ environmentally-friendly products.
7. The system includes a backup ________ system.
8. With the change of the economic foundation the entire immense ________ is more or less rapidly transformed.

Reading Material

EU Funds Nano Packaging Research

UK supermarket chain Sainsbury's is part of an EU-funded project to develop **biodegradable** packaging using nanotechnology. **Nanotechnology**, a field whose name comes from nanometer—a unit of measure one-billionth of a meter, or a mere 10 times the diameter of a single hydrogen atom. Nanotechnology could change the way almost everything—from medicines to computers to automobiles to objects not yet imagined—is designed and made.

Over the past five years packaging suppliers have been introducing various forms of biodegradable packaging, based on **projections** that consumers and recycling regulations will drive demand for environmentally-friendly packaging. Supermarket chains, such as Wal-Mart, have also been driving the change throughout its suppliers.

The EU project, SustainPack, aims to create new environmentally-friendly fibre-based packaging to replace oil-based plastics. The fibres are obtained from natural, sustainable raw materials, such as wood.

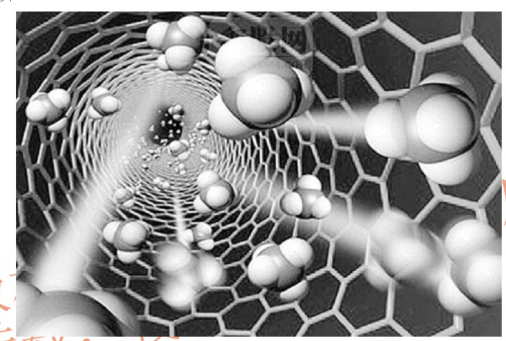
They can then be modified using nanotechnology techniques to provide the needed qualities, said Chris Breen, a research from Sheffield Hallam University, one of the project partners. "Developing sustainable packaging that can compete effectively with packaging derived from petrochemical-based polymers is extremely challenging," he said.

One of SustainPack's project goals is to increase the dry, moist, and wet strengths of fibre-based packaging materials, allowing the design of more cost-effective packaging by using less material.

Researchers have set a target of reducing material use by 30 percent. At Sheffield Hallam University work is underway on the design of nanoclay particles, which are expected to significantly improve the barrier properties and mechanical strength of the new biopolymer films and coatings.

"One of the more unusual modifiers that we are using to make the nanoclays more compatible with, and disperse throughout the biopolymer films, to effectively repel water molecules is a molecule called chitosan, which is derived from the shells of crustaceans, such as crabs and lobsters," said Breen.

SustainPack researchers said they are currently developing some sample packages, which they hope to demonstrate to some of the project's industrial partners, including Sainsbury's and Smurfit-Kappa Group. Smurfit-Kappa Group is one of Europe's largest manufacturers of packaging products.



The four year research programme has a budget of €36million, about half of which comes from an EU research programme.

The SustainPack project brings together a consortium of 35 participants from 13 countries, representing packaging research associations, academia and industry.

In 2002, EU countries generated about 66 million tonnes of packaging waste. In the UK, about 28 million tonnes of waste every year is landfilled, a figure which is expected to double over the next 20 years.

【Key Words】

biodegradable [ˌbaiəudiˈgreidəbl]	*adj.*	能进行生物降解的
nanotechnology [ˌnænəutekˈnɒlədʒi]	*n.*	纳米技术
projection [prəˈdʒekʃn]	*n.*	预测；规划，设计
compatible with	*adj.*	相容的，一致的
disperse [diˈspɜːs]	*vt.& vi.*	（使）分散，（使）散开
	adj.	分散的
chitosan [ˈkaitəsæn]	*n.*	壳聚糖；脱乙酰壳多糖
crustacean [krʌˈsteiʃn]	*n.*	甲壳纲动物（如蟹、龙虾）

consortium [kənˈsɔːtiəm]　　n.　　财团；组合，共同体

【Questions】

1.What is the concept of “nanotechnology”?

2.What is the aim of the EU project, SustainPack?

参考译文

第6章 包装管理

案例分析

宜家（IKEA）改变茶蜡的包装

宜家成立于 1943 年。在销售量、成长率、分店数量、进入国家的数量等方面，宜家是公认的世界上最好的零售商之一。它也是公认的视包装和物流为成功的重要因素的公司。

在宜家商店，顾客直接从展示货架上挑选产品或立刻从仓库拿到产品带回家，在家中进行最终组装操作。宜家对从供应商到最终用户的供应链有完全的掌控能力。现在，有 200 多家宜家商店分布于 31 个国家，在每个国家的经营产品范围几乎都一样。它主要市场在欧洲（82%），其次是北美（15%），再就是亚洲（3%）。宜家开始主要经营家具，现在配套产品和辅助产品也同样兼营。拓宽的产品范围导致很多不同的包装解决方案产生，宜家不得不放弃最初的“平板包装，家中组装”理念。

从一开始，宜家的配送及包装方案就是为使用欧洲托盘的欧洲配送系统安排的。当市场国际化时这就成为一个限制因素。所以，宜家决定解决包装问题。1999 年，宜家创立了一个包装支持功能，叫作“包装理念”。它是指包装技术人员应该更靠近产品及产品开发流程。这意味着新的体系被开发，来满足宜家的不同需求。

宜家一直在探求减少包装及车辆上未使用的空间。2002 年，宜家发现其产品 GLIMMA（宜家的产品名，包括茶蜡及包装）比其他包装有更多的空间。由于 GLIMMA 是大规模销售成功的产品，显然包装上的改变将非常有益。

原始的零售包装是装 100 只蜡烛的塑料袋，见图 6.1。塑料袋被装入硬纸板容器，再装上全尺寸托盘（1 200 毫米×800 毫米），具有展示功能。但塑料袋难以操作，而对地面空间的利用和展示功能也不理想。



图 6.1　左图是新包装解决方案，右图是旧式塑料袋包装

2002年11月，一个旨在提高产品、包装和配送的项目启动了。项目组成员已接受宜家的内部教育，并直接向宜家包装部门的总经理汇报，该总经理与多所大学合作来开发包装事宜。他们与产品开发人员及蜡烛供应商一起组建了一个团队，目标是：使浪费空间的塑料袋在从供应商到商店的供应链各环节上更有效。2003年2月，他们为整个供应链确定了一个解决方案，预期能实现茶蜡的所有技术性能。2003年7月，从中国的供应商那里运来了四托盘的模型产品。

在新的德国系统中，一个欧洲托盘现在能装360包，每包装100只茶蜡，而不是以前一个托盘上装252包。这使得欧洲托盘的使用量从59 524个减少到41 667个。这个减少使每年将产品从仓库运至商店的货车使用量减少200辆。这也促使对成本的降低及对环境影响的减轻。确切地说，每年减少21%由车辆燃烧化石燃料而排放的二氧化碳。新的包装方案还减少了塑料袋、硬纸盒等包装材料。这些节省意味着企业可以增加利润，因为100只茶蜡的价格和以前一样。

商店也节省了时间。新的包装方案使得操作更容易，拆封更快捷，陈列效果更好。由于每托盘的新产品在商店只要花5分钟拆封，宜家算出每年商店可节省186个工作日。

Text A

包装在物流中的重要性

包装与物流系统以不同方式和重要程度上相互影响。包装的规格和包装提供的保护影响所用物料搬运设备的类型和发生破损的水平。包装影响仓库中产品的堆放高度，进而影响仓库的利用率和成本。并且，从一个物流经理的角度看，无论在仓库还是在运输途中，包装对保护产品免受损害来说非常重要。包装也许不能增加产品的价值，但它对物流成本的影响是相当大的。

包装规格可能影响一个公司使用托盘、货架或不同类型的物料搬运设备的能力。很多公司设计的包装太宽或太高，不能有效使用仓库空间和道路上的运输工具。因此，协调包装与仓储、包装与运输的关系非常重要。并且，不好的包装会导致更高的搬运成本，如果货物到达时受损，会影响未来的销售。

包装对物流和供应链管理很重要，它对公司的其他职能区域也很重要。如物料搬运，包装对不同的人意味着不同的事。因为包装涉及一些组织部门，而且这些功能实体需要协调各种涉及包装的因素。

信息提供对物流人也很重要。存放在仓库的货物必须贴上适当的识别标签，这样仓库工作人员可正确、容易地识别它们。商家在设计包装时，会花很多时间和精力以确保包装能给仓库工作人员提供信息。公司在将商品入库时可用色彩代码。公司必须在包装上注明重量来告知搬举它的人，或判断它的上面能放什么。提供信息的技术包括色彩编码、通用产品代码、机读表、符号和数字代码。一个公司的技术或技术串联取决于组织所处的特殊环境。

包装的一个重要的考虑因素是连接物料搬运和运输时搬运的方便性。例如，大件包装从产品角度看是需要的，但内容物的尺寸和重量可能导致物料搬运设备的作业问题，以及进出运输设备困难；所以任何包装设计都应尽力扩大产品在仓库和运输中搬运的方便性。搬运的

方便性对生产经理也非常重要，因为是生产人员把产品装入包装的。

设计包装要考虑的重要事项包括三个方面。第一是包装的物理维度。设计时必须考虑对仓库、运输工具和托盘的空间利用。产品的物理维度还必须与公司的物料搬运设备相适应。第二是包装强度。包装设计者必须分析包装的高度、搬运、搬运包装的设备的类型。第三是包装的形状。

随着客户服务在物流规划中扮演着越来越重要的角色，公司设计包装时需要结合客户的物料搬运设备。与公司革新设备相匹配的包装可以方便地被系统运送；然而，与客户包装不兼容的设备将削弱它接受、储存货物的能力。在这种情形下，客户服务的价值就丧失了。

物流经理最关心的是保护包装内的商品。例如，在仓库中，运动中的货物可能会从传送带上掉下，或被叉车击中，这时包装必须对产品提供足够的保护。当货运代理公司搬运货物时，这种保护也很重要。保护作用还意味着如下内容：当产品与其他货物接触时，使其免受污染，使产品免受水渍的风险、气温变化的伤害、偷盗风险及搬运过程中的震动。有时，包装必须支撑堆在它上面的产品的重量，或者在包装内提供均衡的重量分布，以便于手工或自动化物料搬运。

Text B

包装有助于优化物流单元

1．智能整合使效率更高

包装有助于优化物流单元，借助于包装，物流单元如欧洲托盘可被建成运输产品的集体单元。理想情况下，这些单元在整个配送链中可保持完好无损，不必被拆成零件。对于一个物流经理来说，最佳状态是将才生产好的产品装上托盘，与其他单元一起装入运输车辆，然后一起运送给客户。装载、转运和卸载都可由叉车等辅助设备轻松完成。

2．精简输送链

物流单元是将货物合并成标准形状和尺寸单元的产物。目标是简化产品流从而降低成本。这个过程被非常贴切地称为“单元化”。这个概念背后的理念是：从供应商流向客户的一定量的产品，如果构成越简单，操作就越顺利。

物流单元在整个物流体系中扮演了一个中心角色，因为它体现了各个阶段与产品流之间的联系。因此，物流单元的构成成为一个有效输送链的条件。

输送链可由以下操作来精简：

（1）将物品组合成更大的单元。

（2）标准化单元的形状和尺寸。

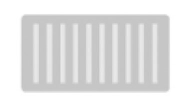
（3）装卸作业中便利机械装置的使用。

（4）确保单元易堆叠。

（5）选择能使供应商和客户之间的输送链更连续的单元。

3．物流单元的多样性

物流单元有很多形状，如大集装箱、小集装箱、箱型托盘、平托盘和堆叠托盘。下面这部分内容详细描述这些最佳物流单元。


大集装箱


小集装箱


箱型托盘


平托盘

1）大集装箱

大集装箱是指海运集装箱或标准集装箱，它们多用于国际贸易。普遍存在的标准集装箱宽 8 英尺（2.438 米），长度是 20 英尺（6.096 米）或 40 英尺（12.192 米）。术语 TEU 是标准的实际范围内通用的集装箱运量统计单位。一个 TEU 是一个 20 英尺长的集装箱，一个 40 英尺长的集装箱相当于两个 TEU。

美国人马尔科姆·麦克莱恩是想出在海洋运输中用标准集装箱这个主意的人。他发明的海运集装箱彻底改变了国际贸易，甚至使国际贸易得到普及，对全球化作出相当大的贡献。

大集装箱的另一个例子是航空货运集装箱，又称为 ULD 集装箱。它们被精确地设计成匹配各种飞机的内部空间，以确保飞机的宝贵货仓得到最大利用。这些集装箱的优点是：需装载的单元少，节省时间、费用和地勤人员。

2）小集装箱

在业务操作中，小集装箱适用于储存、挑拣、运输零部件。它们有标准尺寸，经常可堆叠，这一特征使得多个小集装箱可以共同装入托盘这种物流单元。小集装箱包括塑料容器、纸箱、折叠单元、隔离箱和食物容器及散货容器。

3）箱型托盘

箱型托盘是容器和托盘的结合体。它以托盘为基础，上部结构是钢丝网、金属板或木板。它用来混合储存各种大数量或大体积的已包装货物。

4）平托盘

欧洲最著名的平托盘是欧洲托盘，简称“欧盘”。它是一个欧洲运输公司规范过的承载工具。欧洲普遍使用 800 毫米×1 200 毫米的托盘，也使用过其他几个国际标准组织的尺寸。在北美最常用到的托盘尺寸是 48 英寸×40 英寸，或 1 219 毫米×1 016 毫米。作为一个规则，标准集装箱中不使用欧盘，因为欧盘与标准集装箱不匹配。出现不同尺寸的原因是来源于完全不同的系统。标准集装箱是在美国发展形成的，而欧盘则是在欧洲发展形成的。

5）堆叠托盘

堆叠托盘是有 4 个角柱的平托盘，这些角柱使得一个托盘可以叠加到另一个托盘上，层层相叠。托盘四角上的垂直角柱有一个标准的外形，有些是固定的，有些是可拆的。堆叠托盘的外部尺寸和运载能力与箱型托盘大致相同。当几个这样的结构垂直叠放，这些堆叠托盘也可被用作托盘架。

阅读材料

欧盟斥资研究纳米包装

英国的 Sainsbury’s 连锁超市是欧盟提供资金的项目之一，该项目致力于用纳米技术开发生物可降解包装。纳米技术的名字来源于微小的度量单位纳米——相当于 1 米的十亿分之一，或者仅仅是氢原子的 10 倍。纳米技术几乎可以改变所有的东西——从药品、计算机、汽车，

到现在还想象不到的物体——的设计和制造方式。

包装供应商预计消费者会需要更多的对环境无害的包装，回收规则也会促进对环境无害包装的需求，因此过去 5 年他们一直在引进各种形式的生物可降解包装。许多连锁超市，如 Wal-Mart，也早已通过对供应商的控制来促进这一变化。

欧盟的“可持续包装”项目的目标是创造新的对环境无害的以纤维为原料的包装来取代石油中提取的塑料原料包装。这种纤维是可从自然界获得，不破坏生态平衡的原材料，如木材。

谢菲尔德•哈莱姆大学的研究员克里斯•布林说：“可用纳米技术这些原材料改造以获得想要的品质。”谢菲尔德•哈莱姆大学是项目的参与方之一。“开发出的可持续包装比石化聚合物包装更具有竞争优势，这是件特别有挑战性的事。”他说。

可持续包装项目的另一个目标是增加天然纤维原料包装的干态强度、微湿强度和湿态强度，通过减少用料来设计出更物有所值的包装。

研究者们已设定了一个减少 30%用料的目标。在谢菲尔德•哈莱姆大学设计纳米泥的工作正在进行，研究者们指望它能显著地提高新的生物聚合物薄膜和涂层的防护性能和机械强度。

“我们正在使用的不寻常的改良剂之一是一种叫壳聚糖的分子，它能使纳米泥更相容并疏散到生物聚合物薄膜中，有效地抵制水分子。壳聚糖可从甲壳类动物的壳中获得，如螃蟹和龙虾。”布林说。

可持续包装研究者们说他们目前正在研制一些样品，希望能给该项目的产业伙伴（包括 Sainsbury’s 连锁超市和 Smurfit-Kappa 集团）做演示。Smurfit-Kappa 集团是欧洲最大的包装产品制造商之一。

为期 4 年的研究项目得到 3 600 万欧元的经费，其中约一半来自于一个欧盟研究计划。

“可持续包装”项目汇集了一个由来自 13 个国家，35 个参与方组成的财团、代表性的包装研究协会、学术界和工业界。

2002 年，欧盟国家共产生了 6 600 万吨包装垃圾。在英国，每年掩埋约 2 800 万吨垃圾，这个数字在 20 年后可望翻番。



Chapter 7

Distribution Management



Case Study

Distribution Management: Control and Collaboration from Supplier to Customer

Your distribution network extends from your supplier's loading dock to your customer's front door—far beyond the walls of your warehouse. Save a step or simplify a process, and you deliver faster—which not only **enhances** your bottom line, but also improves service levels. When you're dealing with scores of suppliers on distant continents, 3PL companies, **multiple** distribution centers and customers around in the world, getting visibility into the full distribution process can be extremely challenging.

Manhattan Associates' Distribution Management is a complete suite of solutions to automate every link in the most complex supply chains. Distribution Management is anchored by Manhattan's proven and industry-leading warehouse management solutions. It is engineered for optimal collaboration and communication with an extensive network of suppliers and partners—but does not require any of them to make a major technology investment to do business with you.



With confidence in your ability to work closely with your network, suppliers and customers, you can fill orders even before you have received the product. You will have the information you need to motivate your suppliers, as well as your own workforce, to move products faster and more accurately—for happier customers and less happy competitors.

Distribution Management spans your supply chain network with this extensive suite of products:

(1) Warehouse Management—Fine-tune your facility with a more efficient layout, well utilized resources, streamlined inventory and flawless order fulfillment.

(2) Slotting Optimization—Match slots to demand, weight and other product characteristics for faster, more accurate picking resulting in improved productivity.

(3) Labor Management—Standardize and track workforce performance throughout your operation. Reward quality and safety, boost productivity and forecast with better precision.

(4) Labor Scheduling Optimization—Automate workforce planning and scheduling to lower unit labor costs, **maximize** skill sets, and increase customer service and productivity.

(5) Billing Management—Assign and manage charges for virtually any warehouse event for a full understanding of your costs and profits. Track activities by unit or client.

(6) Supplier Enablement—Extend powerful supply chain capabilities to your suppliers, and automate communications and record-keeping—all online.

(7) Hub Management—Give hubs and 3PL providers instant visibility of orders, shipments and inventory. Streamline transport and inventory by managing partner- to-partner shipping.

【Key Words】

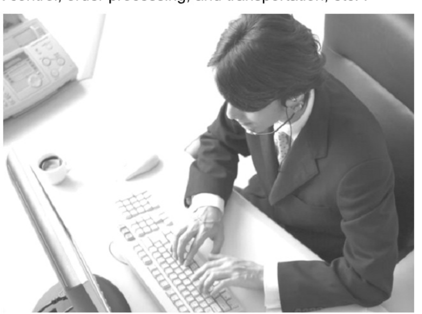
enhance [in'hɑ:ns] *vt.* 提高，增加；加强
multiple ['mʌltip] *adj.* 多重的；多个的；多功能的
maximize ['mæksimɑiz] *vt.* 最大化；使增至最大限度，最大限度利用
vi. 尽可能广义地解释；达到最大值



Text A Concept of Distribution Management

1. Definition for Distribution Management

The business for distribution management is that the management of the efficient transfer of goods from the **place of manufacture** to the **point of sale** or consumption. Distribution management encompasses such activities as warehousing, materials handling, packaging, stock control, order processing, and transportation, etc. .



2. The Importance of Distribution Management

Distribution management is an integral part of company management, which is a **crucial**

concern for businesses that operate in global markets **transformed** by new information and communication technologies.[1] Products and services are increasingly developed, produced, and sold in different geographic regions. Companies **outsource** as many non-core activities to other firms around the world as possible. Thus, transportation and distribution networks may influence **performance** and competitiveness within international markets.

3. The Function of Distribution Management

The distribution management consists of four **subordinate** organization units: the sales management, product delivery, transport management and vehicle management divisions.[2] Compendiously, the distribution management handles customer orders, generates sales plans, and ships products to customers. The sales management is responsible for managing orders and contracts, generating sales and delivery plans, and making statistics of sales and settlement data. The transport management is responsible for arranging sufficient transport capacities, making timetables of loading and dispatching. The product delivery is responsible for loading the goods and measuring the product **fluxes**, in accordance with the bills of lading. The vehicle management division is responsible for managing the vehicle owned by the company.

4. Distribution Management System

A distribution management system performs a wide range of information **transactions**, such as customer order entry, distribution planning, transport arrangement, vehicle scheduling, product loading, measuring control, issuing entry/exit **visas**, generating statistical reports of sales, etc. .

5. Function View Model

Function view models (see Figure 7.1) are created to **represent** the functional relationships among the information processing transactions:[3]

(1) Sales Management is responsible for generating sales plans, handling customer orders, and providing foundations for finance settlements.

(2) Transport Management is responsible for arranging transport capacities, **itineraries** and timetables for carrying out product deliveries.[4] A fundamental issue of the transport management in a company is to arrange sufficient vehicle and **optimally** schedule them against tracks.

(3) Delivery Management generates **log files** on vehicle entries(exits), carries out the loading orders and controls the loading processes.

(4) Vehicle Management records and provides status information of the vehicle owned by the company. It is also responsible for routine maintenance of the vehicle.

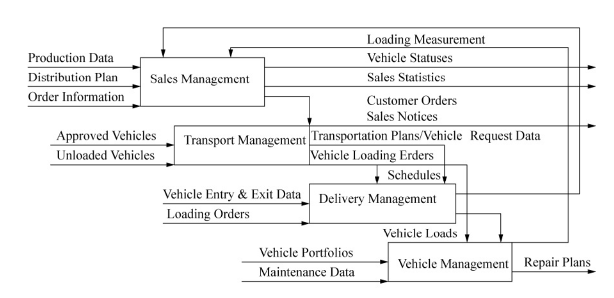


Figure 7.1 Function view model of the distribution management system

【Key Words】

place of manufacture　　生产地点

point of sale　　销售地点

crucial ['kru:ʃəl]　*adj.*　关键的，至关重要的；严酷的，艰难的

transform [træns'fɔ:m]　*vt.*　使改变，使改观；改造，改革，改善；使变换

outsource ['aut,sɔ:s]　*v.*　外包（工程）；外购

performance [pə'fɔ:məns]　*n.*　演出，演奏；履行，完成；成绩，成果；工作

subordinate [sə'b ɔ:dənit]　*a.*　下级的（+to）；次要的，隶属的（+to）

compendiously [kəm'pendiəsli]　*adv.*　简洁地，摘要地

flux [flʌks]　*n.*　流出，涨潮，变迁

　vt.　使成流体，使熔化

　vi.　变成流体；熔化

transaction [træn'zækʃən]　*n.*　办理，处置，执行；交易，业务

visa ['vi:zə]　*n.* & *vt.*　签证，签准

represent [ˌrepri'zent]　*vt.*　描绘，（抽象地）表现；作为……的代表

itinerary [ai'tinərəri]　*n.*　旅程，路线；旅行计划；旅行记录；旅行指南

　a.　旅行的，旅程的，路线的

optimally　*adv.*　最佳地

log files　　日志文件


【参考视频】

【Notes to Text A】

[1] Distribution management is an integral part of company management, which is

a crucial concern for businesses that operate in global markets transformed by new information and communication technologies.

"that operate in global markets transformed by new information and communication technologies"是"that"引导的定语从句，修饰"business"。

[2] The distribution management consists of four subordinate organization units: the sales management, product delivery, transport management and vehicle management divisions.

"consists of"是动词短语，意为"由……组成，构成"。

[3] Function view models are created to represent the functional relationships among the information processing transactions.

"are created to"是被动语态，意为"被用来做……"。

[4] Transport Management is responsible for arranging transport capacities, itineraries and timetables for carrying out product deliveries.

"is responsible for"意为"对……负责"。

【Exercises to Text A】

【参考答案】

Ⅰ. Fill in the blanks.

d________ management
配送管理

vehicle p________
车辆组合

place of m________
生产地点

point of c________
消费地点

m________ handling
物料搬移

c________ concern
关键问题

non-c________ activity
非核心活动

s________ organization
下属机构

product d________
产品交付

l________ files
日志文件

Ⅱ. Fill in the blanks with proper words or expressions.

1. Companies ________ as many non-core activities to other firms around the world as possible.

2. Transportation and ________ networks may influence ________ and competitiveness within international markets.

3. ________, the distribution management handles customer orders, generates sales plans, and ships products to customers.

4. Delivery management generates ________ on vehicle entries(exits), carries out the loading orders and controls the loading processes.

5. Vehicle management is also responsible for ________ of the vehicle.

Ⅲ. Please write a paragraph introducing the functional relationships among the information processing transactions of the distribution management system.

Ⅳ. Questions for discussion.

1. What is distribution management?
2. Why is the distribution management important for a company?
3. Please describe the function of distribution management.

Ⅴ. Translation.

1. 配送管理是公司管理必不可少的一部分。

2. 运输和配送网络可能会影响在国际市场的业绩和竞争力。

3. 配送管理包括单位销售管理、产品交付、运输管理和车辆管理4个下属部门。

4. 配送管理系统执行广泛的信息处理。



【参考视频】

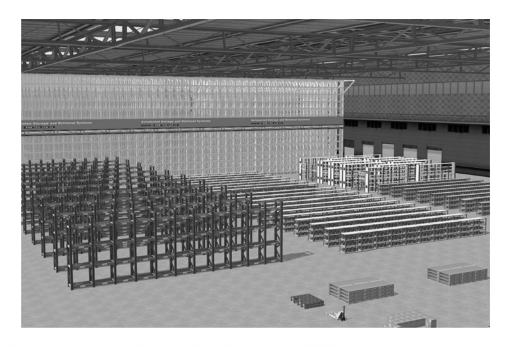
Text B Distribution Center

1. Concept of Distribution Center

Distribution center (DC) is a **logistics link** to fulfill **physical distribution** as its main function. Generally speaking, it's a large and highly **automated** center **destined** to receive goods from various plants and suppliers, take orders, fill them **efficiently**, and **deliver** goods to customers as quickly as possible.[1]

2. Differences to a warehouse

Unlike a warehouse, however, the emphasis of a distribution center is on the moving of goods rather than on long-term storage. Practically, it's a short-term storage center located close to a major to facilitate the rapid processing of orders and shipment of goods to customers.



The difference between Distribution Centers and Warehouses is as follows:

Warehouses	Distribution centers
Warehouses (Ws) handle most products in four cycle, e.g., receive, store, ship, and pick.	Distribution centers (DCs) handle most products in two cycle, e.g., receive and ship.
Ws perform a minimum of value-added activities (receive-store-ship generally in original forms).	DCs perform a great deal of value-added activities, e.g., final assembly (applying the **postponement** strategy).
Ws collect data in batches (generally) (receive and ship goods in batches).	DCs collect data in real time (Might deliver less than the batch size. The transfer batch may not, and many times should not, be equal to the process batch-OPT rule).[2]
Ws store all products (slow or fast moving).	DCs hold predominantly high demand items.
Ws focus on minimizing the operating costs to meet shipping requirements.	DCs focus on maximizing the profit impact of fulfilling customer (external customer) delivery requirement.

3. Trends of Distribution Center

There are some experts in this field that predict the **demise** of warehouses because in inventory stocking will no longer be needed. They claim that efficient consumer response (ECR) and Just In Time (JIT) in combination with **point of sales** (POS) data will fully **synchronize** the company's demand chain. Most other experts disagree and believe that integrated logistics will spur DCs to modify their roles, which will be based on speeding the flow of products and providing value-added services. Examples of the changing role of warehouses can be seen in **consolidations** of shipments, cross-docking, and value-added processes such as packaging, **sub-assembly**, **kitting**, labeling, and final custom work such as providing color and style to products based on customer orders. Certainly, e-commerce has led to warehouse expansion in the USA and Europe and **refocus** by existing warehousing companies.

【Key Words】

distribution center		配送中心
logistics link		物流结点
automated	*adj.*	自动化的
destine [ˈdestin]	*vt.*	命定，注定；指定
efficiently [iˈfiʃəntli]	*adv.*	效率高地，有效地
deliver [diˈlivə]	*vt.*	投递；传送；运送；履行（诺言）；实现（期望）
	vi.	递送，送货，传送；履行，实现
postponement [ˌpəustˈpəunmənt]	*n.*	延期，延缓
demise [diˈmaiz]	*n. & vt .*	消失，死亡
point of sales		销售时点信息系统（缩写为 POS）
synchronize [ˈsiŋkrənaiz]	*vt.*	使同时；使协调，使同步
	vi.	同时发生；画面和声音一致
spur [spəː]	*v.*	鞭策，刺激
consolidation [kənˌsɔliˈdeiʃən]	*n.*	巩固，合并
sub-assembly	*n.*	分装
kit [kit]	*n.*	成套工具，用具包，工具箱，成套用具
refocus [ˈriːˈfəukəs]	*vt.*	重调……的焦距
	vi.	重调焦距，重调重心，重新聚集

【Notes to Text B】



【对应翻译】

[1] Generally speaking, it’s a large and highly automated center destined to receive goods from various plants and suppliers, take orders, fill them efficiently, and deliver goods to customers as quickly as possible.

“generally speaking”是现在分词短语作状语。

[2] The transfer batch may not, and many times should not, be equal to the process batch-OPT rule.

“may not”“should not”是情态动词的否定式，表示语气。

【Exercises to Text B】



【参考答案】

I. Fill in the blanks.

配送中心	总装（配）
d________ center	Final ________
销售时点信息系统	需求链
________ of sales information system	demand c________

物流结点	成批地
logistics l________	in b________
有效顾客反应	外部顾客
e________ consumer response	e________ customer
增值活动	接受订单
value-________ activities	t________ orders

Ⅱ. Fill in the blanks with proper words or expressions.

1. Distribution center is ________ to fulfill physical distribution as its main ________.

2. Practically, it's a ________ center located close to a major to facilitate the rapid ________ of orders and shipment of goods to customers.

3. DCs ________ on maximizing the profit impact of ________ (external customer) delivery requirement.

4. They claim that ________ and Just In Time (JIT) in combination with ________ data will fully synchronize the company's demand chain.

5. Examples of the changing role of warehouses can be seen in ________, cross-docking, and ________.

Ⅲ. Please write a paragraph introducing the performance cycle, activities, data—collecting, product stored and the focus of DC.

Ⅳ. Questions for discussion.

1. What do you think of the major difference between Distribution Centers and Warehouses?
2. Why do some experts predict the demise of warehouses?
3. How do other experts predict the changing of the role of DCs?

Ⅴ. Translation.

1. 配送中心强调的是货物的移动，而不是长期储存。

2. 这一领域的一些专家预测仓库将会消失，因为库存将不再需要。

3. 配送中心侧重于满足客户（外部客户）交付需求的利润最大化。

4．大多数其他专家并不同意，他们相信整合物流将会刺激配送中心调整角色。



Text C Physical Distribution

1. Conception of **Physical Distribution**

Physical distribution operations involve processing and delivering customer orders. Physical distribution is integral to marketing and sales performance because it provides timely and economical product availability.[1] The overall process of gaining and maintaining customers can be broadly divided into transaction-creation and **physical-fulfillment** activities.[2] The transaction-creating activities are advertising and selling. Physical distribution performs the physical-fulfillment activities.

2. Distribution Performance Cycle

The physical distribution performance cycle involves five related activities. They are order transmission, order processing, order selection, order transportation, and customer delivery. The basic physical distribution performance cycle is **illustrated** as shown in Figure 7.2.

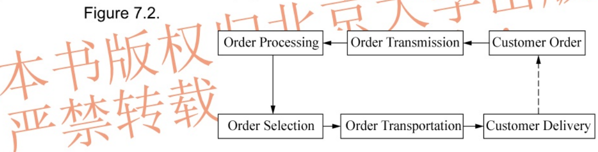


Figure 7.2 The basic distribution performance cycle

From a logistical perspective, physical distribution links a firm with its customers. Physical distribution resolves marketing and manufacturing initiatives into an integrated effort. The interface between marketing and manufacturing can be **conflictive**. On the one hand, marketing is dedicated to delighting customers. In most firms, minimal limits are imposed by marketing and sales when it comes to accommodation customers. Often, this means that marketing and sales would like to maintain a broad product line with high inventory regardless of each product's actual profit potential.[3] In this way, any customer's requirement, no matter how small or large, would be satisfied. The expectation is that zero defect service will be achieved and customer-focused marketing efforts will be supported.

The very fact that physical distribution deals with customer requirements means that related operations will be more **erratic** than characteristic of manufacturing support and procurement performance cycles. Attention to how customers order products is essential to reduce physical distribution operational variance and simplify transactions.[4] First, every effort should be made to improve forecast accuracy. Second, a program of order

management coordination with customers should be initiated to reduce uncertainty as much as possible. Third, and finally, physical distribution performance cycles should be designed to be as flexible and responsive as possible.

The key to understanding physical distribution performance-cycle **dynamics** is to keep in mind that customers initiate the process by ordering. The logistical response capability of the selling enterprise constitutes one of the most significant competencies in overall marketing strategy.

3. Types of Distribution

Three types of distribution can be used to make product available to consumers: intensive distribution, selective distribution, and exclusive distribution.

1) Intensive Distribution

In intensive distribution, the product is sold to as many appropriate retailers or wholesalers as possible. Intensive distribution is appropriate for products such as chewing gum, candy bar, soft drinks, bread, film, and cigarettes where the primary factor influencing the purchase decision is convenience. Industrial products that may require intensive distribution include pencils, paper clips, **transparent** tape, file folders, typing paper, screws and nails.

2) Selective Distribution

In selective distribution, on the other hand, the number of **outlets** that may carry a product is limited, but not to the extent of exclusive dealing. By carefully selecting wholesalers or retailers, the manufacturer can concentrate on potentially profitable accounts and develop solid working relationships to ensure that the product is properly merchandised. The producer also may restrict the number of retail outlets if the product requires specialized servicing or sales support. Selective distribution may be used for product categories such as clothing, appliances, televisions, stereo equipment, home furnishings, and sports equipment.

3) Exclusive Distribution

When a single outlet is given an exclusive **franchise** to sell the product in a geographic area, the arrangement is referred to as exclusive distribution. Products such as specialty automobiles, some major appliances, certain brand of furniture, and lines of clothing that enjoy a high degree of brand loyalty are likely to be distributed on an exclusive basis. This is particularly true if the consumer is willing to overcome the inconvenience of traveling some distance to obtain the product. Usually, exclusive distribution is undertaken when the manufacturer desires more aggressive selling on the part of the wholesaler or retailer, or when channel control is important. Exclusive distribution may enhance the product's image and enable the firm to charge higher retail prices.

【Key Words】

physical distribution　　实物配送

physical-fulfillment　　实物履行
illustrate [ˈiləstreit]　*v.*　解释说明；插图
conflictive [kənˈfliktiv]　*adj.*　冲突的
erratic [iˈrætik]　*adj.*　反复无常的，不稳定的；古怪的，乖僻的
dynamics [daiˈnæmiks]　*n.*　动态；动力学
transparent [trænsˈperənt]　*adj.*　透明的
outlet [ˈautlet]　*n.*　市场渠道；商店
franchise [ˈfrænˌtʃaiz]　*n.*　特许（经营）权

【Notes to Text C】


【对应翻译】

[1] Physical distribution is integral to marketing and sales performance because it provides timely and economical product availability.

"because it provides timely and economical product availability"是"because"引导的状语从句。

[2] The overall process of gaining and maintaining customers can be broadly divided into transaction-creation and physical-fulfillment activities.

"transaction-creation and physical-fulfillment"这种结构为复合词，作形容词修饰"activities"。

[3] Often, this means that marketing and sales would like to maintain a broad product line with high inventory regardless of each product's actual profit potential.

regardless of　不管，不顾

[4] Attention to how customers order products is essential to reduce physical distribution operational variance and simplify transactions.

"attention to how customers order products"是主句的主语。

【Exercises to Text C】

【参考答案】

Ⅰ. Fill in the blanks.

1. The overall process of ________ customers can be broadly divided into and physical-fulfillment activities.

2. They are order transmission, ________, order selection, ________, and customer delivery.

3. Often, this means that marketing and sales would like to maintain a broad product line with high inventory ________ each product's actual profit potential.

4. The ________ that physical distribution deals with customer requirements means that related operations will ________ than characteristic of manufacturing support and procurement performance cycles.

5. Physical distribution ________ should be designed to be as ________ as possible.

6. The producer also may ________ the number of retail outlets if the product requires specialized servicing or ________.

Ⅱ. Please complete the following table to get yourself familiar with the information on types of distribution.

Type of distribution	Appropriate customers	Appropriate products

Ⅲ. Questions for discussion.

1. Please explain the physical distribution performance cycle.

2. Discuss and compare three approaches of distribution: intensive distribution, selective distribution, and exclusive distribution.

3. Why do we say that physical distribution links a firm with its customers?

 **Reading Material**



【参考视频】

An Integrated System of Distribution Center

1. Designing and Equipping Distribution Is a Complex Process

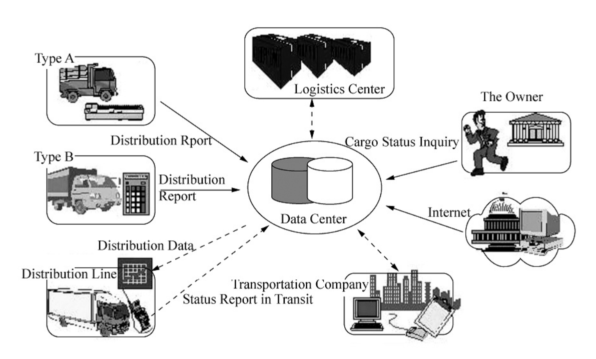
Designing and equipping distribution centers is a complex process, and simply integrating all of the different hardware, software and controls required for today's state-of-art distribution systems has become a major logistics exercise in itself.

Distribution center design is a dynamic process that is constantly **evolving** to meet changing marketplace demands and expectations. An example is illustrated as follows—The **installation** was designed to integrate the flow of product throughout the following functional areas of the distribution center: receiving, value-added service (VAS) preparation, VAS processing and **takeaway**, put-to-store location, and shipping.

2.The Sports Authority's Regional Distribution Center

Inbound goods are moved from receiving areas to value-added service(VAS) processing station. After scanning and tag-generation, **totes** move on powered takeaway unit to VAS processing area, where they accumulate on EZ-Logistics **conveyors**. After processing, they move up a belt incline to a **re-circulation** loop. Totes are **diverted** off the loop to one of five "fingers" in put-to-store location. Operators fill and seal cartons for the appropriate store and then place them on takeaway conveyor for movement to shipment **staging**. Here they **merge** with full **pallet** orders for truckload delivery to the stores.

To achieve that desired integration, the Sports Authority relies on a wide range use of Hytrol equipment. The units include accumulation conveyors, belt inclines and declines, live rollers, sorters and diverts , trash takeaway conveyors , and more. When operator scans the tote, the terminal displays the quantity of product inside the tote to be put store location specified.



Inbound goods from the vendors are initially handled in a VAS preparation area. The operators here remove the contents from the cartons and place the items in totes. The totes then are scanned and the information is entered into the WMS[13]. Labels that will accompany the items through the order-fulfillment process are generated at this point as well. Trash takeaway conveyors in the processing area help keep the facility clean and free from **debris**.

The totes then are placed on a powered conveyor that carries them to the VAS processing area. Each tote is diverted to one of four **lanes**, where they accumulate on the EZ-Logistics conveyors. Processing personnel retrieve the totes from the main accumulation line by pressing a foot pedal that controls a **pneumatic** divert. A work surface at bottom of the **chute** serves as a table for the processor to empty the contents of the tote and apply the labels and tags. Once the VAS processing is done, the totes are placed on an outbound chute, which leads to a takeaway conveyor and up an incline to a re-circulation loop.

Automated diverts send the processed totes from the re-circulation loop down one of "five fingers" in the put-to-store location section of the distribution center. There's a total of 152 work stations in these five accumulation lanes. Once a tote is diverted from the finger lane into a store location zone, the operator scans the tote. The terminal indicates the quantity of the product within the tote to be put to the store location specified.

Operators place the appropriate quantity in a shipping carton, drawing from the carton flow **racks** behind them. Once the sort orders are completed, order is pushed down the carton-flow takeaway lane. These cartons are then **palletized** and taken to shipment staging areas, where full truckloads of product are built for store delivery. The system is **streamlined** and efficient. And most importantly, inventory doesn't get a chance to sit still for very long.

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⑬ WMS　　WMS 是 Warehouse Management System 的缩写，即仓库管理系统。

【Key Words】

evolving	*adj.*	进化的，展开的
installation [ˌinstəˈleiʃən]	*n.*	安装，装置
takeaway [ˈteikəˌwei]	*n.*	移走，入库
inbound [ˈinˈbaund]	*adj.*	入内的，进入方向的
tote [təut]	*v.* & *n.*	搬运；背负；携带；拖，拉；搬运物；携带，
conveyor [kənˈveiə]	*n.*	传送装置
re-circulation	*n.*	循环
divert [daiˈvəːt]	*v.* & *n.*	使转向；使改道；转移；使分心
staging [ˈsteidʒiŋ]	*n.*	待出货；临时台架；演出
debris [dəˈbriː]	*n.*	碎片；残骸；破瓦残砾
lane [lein]	*n.*	小路；巷，弄；狭窄的通道；车道，线道
pneumatic [njuːˈmætik]	*adj.*	空气的，气体的；气动的；充气的，可充气的
chute [ʃuːt]	*n.*	斜槽，导槽，斜道；瀑布；急流；陡坡道
rack [ræk]	*n.*	架子；挂物架；（行李）网架
palletize [ˈpæliˌtaiz]	*v.*	把……放在货盘上
streamlined [ˈstriːmlaind]	*adj.*	精简的，简化的，高效率的

【Questions】

1. Why should we say that distribution center design is a dynamic process?
2. Generally speaking, what are the major functional areas of a distribution center?
3. Please explain the processing procedure in this distribution center.
4. What equipment does the Sports Authority rely on?
5. Do you think this system is efficient? Give your reasons.

参 考 译 文

第7章　配 送 管 理

案例分析

配送管理：从供应商到客户的控制与协作

分销网络从供应商的装卸码头，延伸到客户的门口——远远超出公司的仓库范围。改变一个步骤或简化一个流程，将使公司交货更快——不仅提高了公司的交货底线，而且还提高了服务水平。当你要应对在遥远的洲际供应商、第三方物流公司、多个分销中心和世界各地的客户，进入整个配送过程会是极大的挑战。

Manhattan Associates 公司的配送管理为最复杂的供应链中的每一个自动化环节提供一套完整的解决方案。配送管理主要围绕曼哈顿的被证明居业界领先的仓库管理解决方案。这是为供应商和合作伙伴设计的拥有最佳协作和广泛交流的网络通信——但不要求他们做出巨大的技术投入。

随着网络的深入利用，网络供应商和客户密切合作的信心增强，你甚至可以在收到产品前填写订单。你将获得你所需要的信息来激发你的供应商和你的员工——配送产品更快更准确使客户满意——使竞争对手烦忧。

配送管理覆盖供应链网络与多套产品：

（1）仓库管理——以更有效的布局，更好地利用资源、简化库存和完美订单履行来完善你的设施。

（2）货位优化——根据需求、重量和其他产品特征配备货位，以更快、更准确的捡货，提高生产率。

（3）劳动管理——规范和跟踪整个运作的人力绩效。奖励质量和安全，提高生产力和精确度。

（4）劳动调度优化——自动化劳动力规划和调度，以较低的单位劳动力成本，最大限度地提高技能，提高客户服务水平和生产效率。

（5）计费管理——在全面了解成本和利润的基础上，分配和管理任何实际发生的仓库事件费用。由单位或客户跟踪活动。

（6）供应商组合——给供应商提供扩展功能强大的供应链，所有自动通信和记录保存在线进行。

（7）枢纽管理——做到中心和第三方物流供应商的订单、出货和库存即时可视。通过管理合伙人，对合伙人的运输提高效率和精简库存。

Text A

配送管理概述

1．配送管理的定义

对配送管理的业务定义为从生产场所管理的货物转移到高效率的销售或消费点。配送管理包括仓储、物资搬移、包装、库存控制、订单处理和运输等活动。

2．配送管理的重要性

配送管理是公司管理必不可少的一部分，它是通过新的信息通信技术在全球市场经营业务的一个关键问题。产品和服务日益发展，并在不同的地区生产和销售。企业将许多非核心活动尽可能外包给世界上的其他公司。因此，运输和配送网络可能会影响在国际市场的业绩和竞争力。

3．配送管理的作用

配送管理包括 4 个部门：单位销售管理、产品交付、运输管理和车辆管理部门。简单来说，配送管理处理客户订单，生成销售计划，以及将产品运送给客户。销售管理负责管理订单和合同，生成销售和交货计划，并统计销售和结算数据。交通管理部门负责安排充足的运输能力，制订装卸时间表。交货部门负责根据提单装载货物和测量产品通量。车辆管理部门负责管理企业的车辆。

4．配送管理系统

配送管理系统执行诸如客户订单输入、布局规划、交通安排、车辆调度、产品装载、测量控制、签发入境/出境签证、产生的销售统计报告等广泛的信息处理。

5．功能视图模型

创建的功能视图模型（见图 7.1）描述信息处理交换之间的功能关系：

（1）销售管理负责生成销售计划，处理客户订单，并提供资金结算的基础。

（2）运输管理负责安排进行产品交付的运输能力、路线和时间表。公司运输管理的基本问题是要安排足够的车辆和车辆的最佳时间。

（3）交付管理产生车辆项（出口）日志文件，执行装载命令和控制装载过程。

（4）车辆管理记录并提供由该公司所拥有的车辆身份信息。它还负责车辆的日常维护。

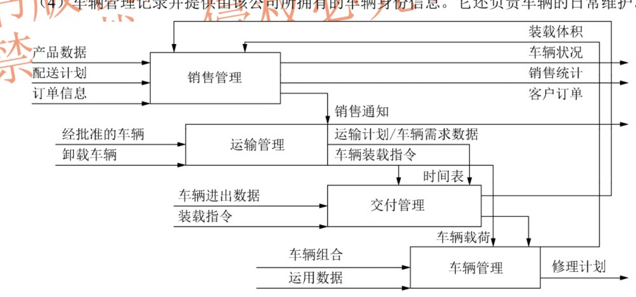


图 7.1　配送管理系统的功能视图模型

Text B

配 送 中 心

1．配送中心的概念

配送中心（DC）是一个以实现实体配送为主要功能的物流结点。一般而言，配送中心是

设计用来从不同工厂和供应商中接收货物、接受订单、高效地履行订单，并且将货物尽快地送给客户的一个高度自动化的大型中心。

2．配送中心与仓库的区别

与仓库不同，配送中心更加强调货物的移动而不是长时间的库存。实际上，它是一个短期库存中心，其选址接近于一个主要（仓库）以促进订单的快速处理和对客户的货物运输。配送中心在运行周期、活动、收集数据、产品储存和侧重点上不同。

配送中心与仓库的区别如下：

仓　　库	配 送 中 心
仓库对大多数货物处理需 4 个环节：接收、存储、托运和分拣	配送中心对大部分货物的处理按 2 个环节：接收、运输
仓库执行很少的增值活动（接收—存储—出运基本都是最初的形态）	配送中心执行了大量的增值活动，如最后装配（应用延迟战略）
一般地，仓库成批地收集信息（即接收、托运货物都是成批的）	配送中心实时收集信息（可能以少于一整批的数量发货。中转批量不可能，而且大多数时候也是不应该与订单批量相等）
仓库储存所有货物（包括慢速和快速流动货物）	配送中心主要储存高需求量货物
仓库侧重使运营成本最小化以满足运输要求	配送中心侧重在满足客户（外部客户）交付需求的利润最大化

3．配送中心的发展趋势

该领域的一些专家预测仓库将会消失，因为库存将不再需要。他们声称结合销售时点信息（POS）的有效客户反应（ECR）、准时制度（JIT）将与公司的需求链完全保持同步。大多数其他专家并不同意，他们相信整合物流将会刺激配送中心调整作用角色，这是以加速商品流通和提供增值服务为基础的。从装运合并、越库、包装、次级装配、成套装配和贴标签等增值处理，以及根据客户订单决定产品颜色和款式的最终定制工作这类例子里可以看出仓库作用的转变。当然，电子商务已经导致美国和欧洲的仓库膨胀，而由于现存的（大量）仓储企业而广为关注。

Text C

实 物 配 送

1．实物配送的概念

实物配送作业包括对顾客订单的处理和交付。实物配送是市场营销和销售绩效必不可少的一部分，因为配送可获得及时而经济的产品。赢得和留住顾客的总体过程可大致分为交易产生和实物履行活动。交易产生活动是指做广告和销售，实物配送执行实物履行活动。

2．配送运行周期

典型的实物配送运行周期包括 5 个相关活动。它们是订单传递、订单处理、订单拣选、订单运输和交付客户。基本的实物配送运行周期如图 7.2 所示。

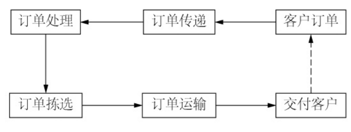


图 7.2　基本的实物配送运行周期

从物流的角度看，实物配送将公司与客户联系起来。实物配送将营销和制造的目的整合为一体。营销和生产制造之间（的界面）会有冲突。一方面，市场营销致力于满足顾客。在大多数企业，向顾客提供货物可使市场营销和销售受到最小的限制。这常常意味着市场营销和销售宁愿保持多条生产线和高库存，而不管每件产品实际的潜在收益。这样，顾客的任何需求，无论大小都能得到满足。实物配送的期望是达到零缺陷的服务，并支持关注顾客的市场营销工作。

实物配送是为了满足客户需求，这一事实意味着与配送相关的操作将会比制造支持活动和采购运行周期的特性更具有不稳定性。关注客户如何订购产品对减少实物配送操作的不协调性和简化交易至关重要。第一，必须尽力改善预测精确度。第二，应该起动一个与客户相协调的订单管理程序，尽可能减少不确定性。第三，也是最后一点，实物配送运行周期应该设计得尽可能具有柔性和响应性。

理解实物配送运行周期动态的关键是，要记住是顾客通过订货启动了这一过程。销售企业的物流响应能力构成了总营销战略中最重要的竞争力之一。

3．配送的类型

3 种类型的配送方式可以用来实现顾客对产品的可获得性：集约型配送、选择性配送和独家配送。

1）集约型配送

在集约型配送中，产品卖给尽可能多的零售商或者是批发商。集约型配送适用于口香糖、糖果、软饮料、面包、胶卷和香烟等影响购买决定的主要因素是其方便性的产品。需要集约型配送的工业产品包括铅笔、纸夹、透明胶带、档案夹、打印纸、螺丝和钉子。

2）选择性配送

另一方面，在选择性配送中，产品销售渠道的数量是有限的，但是未达到独家配送的程度。通过仔细选择批发商或零售商，生产商可以将精力集中于有潜在赢利能力的资金，并建立牢固的工作关系以确保产品交易成功。如果产品需要特殊的服务或销售支撑，生产者也可减少零售渠道。选择性配送适用的产品类型是服装、医疗器械、电视机、音响、家具和运动器材等。

3）独家配送

在一定地理区域内有唯一的销售商获得销售产品的特许经营权，这种安排就叫作独家配送。例如特种汽车、一些重要设备、特定品牌的家具，有很高品牌忠诚度的系列服装等产品，都很有可能是独家配送。如果客户想克服距离带来的不便来获得产品，那就更应如此。通常，在生产商期望批发商和零售商更加卖力销售，或在渠道控制很重要的情况下就会采用独家配送。独家配送会提升产品形象，并能使公司收取更高的零售价。

阅读材料

配送中心的整合系统

1．配送的设计和装备是一个复杂的过程

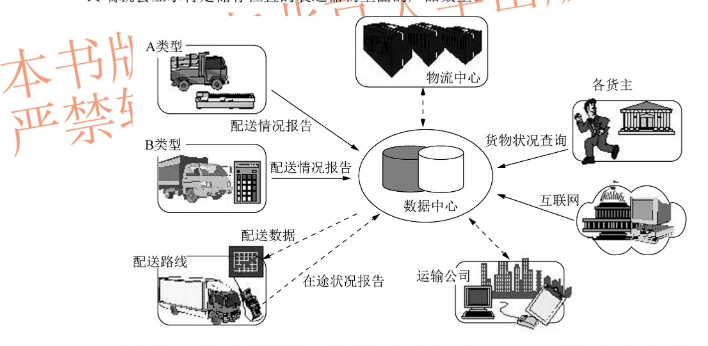
设计和装备配送中心是一个复杂的过程，而简单地将所有不同的软件、硬件及当今现代的配送系统所需的控制装置进行整合已经成为它自身一个主要的物流活动。

配送中心设计是一个动态过程，它不断演变以满足不断变化的市场需求和期望。举例说明一下——装置的设计是为了通过配送中心的下列功能区域来整合商品的流动：收货、增值服务准备区、增值服务活动和搬移、储存定位，以及出货。

2．运动权威的区域性配送中心

进库货物从收货区运到增值服务（VAS）加工站。经过扫描和贴上标签之后，将装运物移到动力装置运往增值服务处理区域，在那里它们集合在 EZ 物流的传送装置。经加工后，将它们移到传输带上，运到一个再循环环路。装运物从再循环环路转移到储存定位中的“五指”形的其中一处。操作员进行装箱和封装后，把货物放到向外运的传送装置运到出货站。在这里，它们集拢成为完整的托盘订单货，以整车货运送到商店。

为了达到那种期望的整合，运动权威广泛地使用 Hytrol 装置。这些装置包括堆垛传送带、皮带上下斜道、活动滚筒、分拣器和转向装置、废物外移传送带等。当操作员扫描装运物时，终端就会显示特定储存位置的装运器物里面的产品数量。



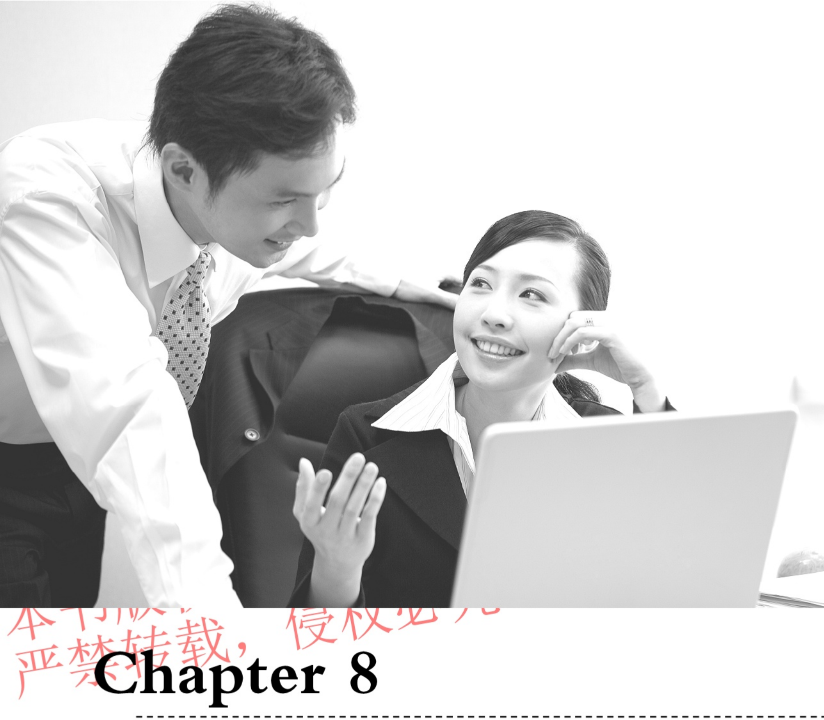
来自供应方的入库货物最初是在增值服务准备区域进行处理。在这里操作员把箱子里的东西拿出并放入搬运箱，然后扫描搬运箱。之后，将信息录入仓库管理系统。伴随着产品贯穿订单履行整个过程的标签也在此处生成。处理区的废物外移传送带帮助保持设施干净、免除碎物。

然后将搬运箱放到动力传送带上，运到增值服务处理区域。每个搬运箱被转移到 4 个通道之一，在那里它们堆垛在 EZ 物流传送装置上。操作员操作，通过踩一个能控制气流转换装置的脚踏板从主要的堆垛线上取到搬运箱。操作员在以斜道底部的工作面作为工作台的地方，

进行清空装运箱和贴标签的工作台。一旦增值服务操作完成，装运物就被放置到外输斜道上，通过外运传送带，再向上传送到达再循环环路。

自动的转向装置将处理好的装运物从再循环环路下传到配送中心的储存定位部门的“五指”形装置。在这些 5 个堆垛的狭窄通道里总共有 152 个工作点。搬运箱一旦从指形狭窄通道转移到仓库储存区域，操作员就会进行扫描。终端就会显示将被放到特定存储位置的搬运箱里面的产品数量。

操作员从身后纸箱流水架中取得合适数量的产品放入出运纸箱。一旦完成订单分拣，订单货物就沿着箱子流程的外移狭窄通道推送下来。然后，将这些箱子放到托盘上带到出货区域，合并成整车货运往商店。这个系统呈流水型而富有效率。最重要的是，没有机会保留很长时间的库存。



Chapter 8

Green Logistics



Case Study

Nokia's Green Logistics

In Nokia, we take responsibility for our environmental impacts and apply life cycle thinking as the **framework** of our environmental work. We measure the environmental impact from our logistics, including the transport of goods from factories to customers, transport of components from suppliers to our manufacturing sites, and the logistics related to take-back, recycling, and reuse of obsolete devices. Nokia has outsourced all the logistics activities to various logistics service providers.

Nokia is in a process of setting CO_2 reduction targets for logistics providers resulting in reductions made by 2012. The actions taken so far relate to efficiency in sales packages, transport efficiency, network **optimization**, planning, research and usage of **alternative** transport methods and sales and transport packaging materials. We are going to develop these areas actively in the future.



NOKIA

Since 2006 we have been reducing the size of packaging which has enabled us to take at least 12,000 trucks off the roads. Development projects on transport materials are **ongoing** and new solutions are being piloted.

Successful pilots have been conducted in using alternative transportation instead of using air cargo and some transport volume has already been shifted to sea freight. Sea, road and even rail transport will replace air transport more and more in the future. We also have a capability to take CO_2 into account in logistics network optimization, in addition to costs and customer service. We work closely with logistic service providers to implement green initiatives and we **appreciate** all green ideas and initiatives from the logistics industry. We can take these innovations further either within Nokia or by working together across industry sectors.

Nokia's logistic network is very extensive. We have focused efforts on developing our methodology and capability to calculate the CO_2 **emissions** generated by Nokia's logistics, to make it as accurate as possible. This enables us to track the impacts of improvement actions and to ensure that we achieve the reduction target. The CO_2 calculation is based on the leg (route) based distance, the emission factor and the weight of products. The emission factor depends on transport mode, vehicle type, and load factor. We need accurate calculations and close **co-operation** with logistic

service providers to get this data. Nokia also works towards a standardized calculation of the CO_2 impact of logistics by participating in the GHG Protocol's standardization working groups.



The two words that make up the title are each charged with meaning, but combined, they form a term that is particularly evocative. Greenness has become a code word for a range of environmental concerns, and is usually considered positively. When put together the two words suggest an environmentally friendly and efficient transport and distribution system. The term has wide appeal, and is seen by many as eminently desirable. However, as we explore the concept and its applications in greater detail, a great many paradoxes and inconsistencies arise, which suggest that its application may be more difficult than what might have been expected on first encounter.

【Key Words】

framework [ˈfreimwɜːk]	*n.*	构架；框架；机构，组织
optimization [ˌɔptimaiˈzeiʃən]	*n.*	最佳化，最优化；优选法；优化组合
alternative [ɔːlˈtɜnətiv]	*adj.*	替代的；备选的；其他的
	n.	可供选择的事物
ongoing [ˈɔngəuiŋ]	*adj.*	不间断的，进行的；前进的
	n.	前进，发展；行为，举止
appreciate [əˈpriːʃieit]	*vt.*	感激；欣赏；领会
	vi.	使增值，涨价
emission [iˈmiʃn]	*n.*	排放，辐射；排放物，散发物；发布，发行
co-operation [kəuˌɔpəˈreiʃəŋ]	*n.*	合作



Text A　Green Logistics



【参考视频】

Green logistics is an answer to one of the greatest struggles in the 21st century: the one between business and **sustainability**. In an environmentally conscious world, businesses are finding it beneficial to improve their environmental impact.[1] When they **undertake** that effort from manufacturing to distribution to consumption, they practice green logistics.

Green logistics focuses on materials handling, waste management, packaging and transport. Reverse logistics(see Text B) is a term sometimes used **interchangeably** with green logistics because it refers to the recycling and reuse of materials after they are successfully distributed to their destination.

The main objective of green logistics is to **coordinate** the activities within a supply chain in such a way that **beneficiary** needs are met at "least cost" to the

environment.[2] It is a principle component of reverse logistics. In the past "cost" has been defined in **purely monetary** terms, whereas "cost" can now also be understood as the external costs of logistics associated with: climate change, air pollution, **dumping** waste (including packaging waste), soil **degradation**, noise, **vibration** and accidents.



Green or sustainable logistics is concerned with reducing environmental and other negative impacts associated with the movement of supplies. Sustainability seeks to ensure that decisions made today do not have an adverse impact on future generations. Green supply chains seek to reduce negative impact by redesigning **sourcing**, distribution systems and managing reverse logistics so as to eliminate any inefficiency, unnecessary freight movements and dumping of packaging.

A good example of one logistics aspect that poses great risk to the environment is packaging. Packaging represents one of the greatest challenges to environmental friendly logistics while at the same time being vital in shipping and storage.

Correct or incorrect packaging has consequences for how much of a product can be stored, how it is stored and or transported in a given space. This can increase to the unit cost if the packaging **hinders optimization** of storage space. Many industries have developed forms of packaging that do all that is required of them in transit but do not justify the expense of returning them to the point of origin. This packaging is only used once and then **discarded**. This principle goes all the way down to the level of individual tins or cartons of food.

It is this type of packaging that presents the greatest challenge to logisticians as, increasingly, there is a responsibility for the supplier and the buyer to recover and recycle or effectively dispose of packaging.

Here are a few companies currently applying green logistics:

(1) Shiply — It is a British company founded on the idea that the current way goods are

shipped to houses is wasteful. The company simply pairs returning trucks that would otherwise be empty with new orders.

(2) DHL — The well known shipping company offers a GOGREEN program that tracks the amount of CO_2 emitted when a company uses DHL to transport merchandise. That way, the company can make informed decisions on how to best reduce carbon emissions.

(3) FedEx — Since 2010, FedEx has been committed to a green logistics focus. The company is increasing its use of **sustainable** energy through an electric and **hybrid** truck fleet.

These companies are taking steps toward an environmentally friendly business that saves money and appeals to customers who want to support sustainability.[3] There are many easy steps taken to implement green logistics in the company:

(1) Reduce package size. Many companies are undertaking R&D to decrease the amount of material used in packaging.

(2) Change modes of transportation. Shipping freight by rail or water is often more environmentally friendly than trucking.

(3) Reduce transportation distance during distribution. As of 2010, heavy trucking accounted for 17 percent of all petroleum used in the United States. By cooperating with the North American Council for Freight Efficiency, you could reduce your freight shipping costs and distances.

(4) Teach drivers eco-friendly techniques such as reducing time on the road by maximizing right turns and minimizing left turns.

(5) Centralize warehousing and optimize efficiency. Larger warehouses are more energy efficient, but lower inventory levels use less energy (heating, refrigeration, lighting, etc.). Switching to LED lighting in warehouses will also greatly reduce electricity costs.

By taking steps like these to make your company a leader in green logistics, you not only save money and gain market advantage, but also you may anticipate future environmental regulations. More importantly, you help create a sustainable business that will **thrive** in our ever-changing world.

【Key Words】

sustainability [səˌstenəˈbiliti]	*n.*	持续性，能维持性，永续性
undertake [ʌndəˈteik]	*vt.*	承担，从事；保证；同意，答应；承诺
interchangeably [intəˈtʃeindʒəbli]	*adv.*	可交换地，可交替地
coordinate [kəuˈɔːdineit]	*vt.*	使协调，使调和；整合；使动作协调
	vi.	协调；协同；成为同等；被归入同一类别
beneficiary [beniˈfiʃəri]	*n.*	受益人；封臣
	adj.	受封的；臣服的
purely [ˈpjuəli]	*adv.*	完全地，十足地；纯粹地
monetary [ˈmʌnitɛri]	*adj.*	货币的，金钱的；金融的；财政的，财政（上）的

dump [dʌmp] *vt.* 倾倒；卸下；摆脱，扔弃；倾销
degradation [degrəˈdeiʃən] *n.* 堕落；潦倒；毁坏；恶化
vibration [vaiˈbreiʃn] *n.* 摆动；震动；感受；一次性往复振动
sourcing [ˈsɔːsiŋ] *n.* 采购
hinder [ˈhində(r)] *vt.& vi.* 阻碍，妨碍；成为阻碍
optimization [ɔptimaiˈzeiʃən] *n.* 最佳化，最优化；优选法；优化组合
discard [disˈkɑːd] *vt.* 丢弃，抛弃；解雇
sustainable [səˈsteinəbl] *adj.* 可持续的；可以忍受的；可支撑的
hybrid [ˈhaibrid] *adj.* 混合的
thrive [θraiv] *vi.* 兴盛，兴隆；长得健壮；茁壮成长

【Notes to Text A】

【对应翻译】

[1] In an environmentally conscious world, businesses are finding it beneficial to improve their environmental impact.

固定搭配：find it beneficial to do sth.

套用搭配：find it + adj. to do sth.

[2] The main objective of green logistics is to coordinate the activities within a supply chain in such a way that beneficiary needs are met at "least cost" to the environment.

句式：the objective is to do sth.

引申：the aim/purpose is to do sth.

[3] These companies are taking steps toward an environmentally friendly business that saves money and appeals to customers who want to support sustainability.

environmentally friendly　环保，环保的；环境友好，环境友善

【Exercises to Text A】



【参考答案】

Ⅰ. Fill in the blanks.

1. Green supply chains seek to reduce negative impact by ________ sourcing, distribution systems and managing ________ logistics so as to eliminate any inefficiency, unnecessary freight movements and dumping of packaging.

2. Many industries have developed forms of packaging that do all that is required of them in ________ but do not ________ the expense of returning them to the point of ________.

3. The main objective of green logistics is to ________ the activities within a supply chain in such a way that ________ needs are met at "least cost" to the environment.

4. These companies are taking steps toward a ________ business that saves money and appeals to customers who want to support ________.

5. Teach drivers ________techniques such as reducing time on the road by maximizing right turns and minimizing left turns.

6. By taking steps like these to make your company a leader in green logistics, you not only save money and gain market advantage, but you may ________future environmental regulations.

Ⅱ. True or false.

1. Green logistics is the same meaning as reverse logistics. ( )

2. FedEx offers a GOGREEN program that tracks the amount of CO_2 emitted when a company uses FedEx to transport merchandise. ( )

3. Shipping freight by trucking is often more environmentally friendly than rail or water. ( )

4. Larger warehouses are more energy efficient, but lower inventory levels use less energy. ( )

Ⅲ. Translation.

1. 绿色物流包括物流作业环节和物流管理全过程的绿色化。

2. 改进物流体系，既要考虑正向物流环节的绿色化，又要考虑供应链上的逆向物流体系的绿色化。

3. 绿色物流的最终目标是可持续性发展，实现该目标的准则是经济利益、社会利益和环境利益的统一。

4. 绿色物流是指以降低对环境的污染、减少资源消耗为目标，利用先进物流技术规划和实施运输、储存、包装、装卸、流通加工等物流活动。

5. 绿色物流也是一种能抑制物流活动对环境的污染，减少资源消耗，利用先进的物流技术规划和实施运输、仓储、装卸搬运、流通加工、包装和配送等作业流程的物流活动。

6. 要想打造绿色物流，首先要对运输线路进行合理布局与规划，通过缩短运输路线，提高车辆装载率等措施，实现节能减排的目标。

7. 绿色仓储一方面要求仓库选址要合理，有利于节约运输成本；另一方面，仓储布局要科学，使仓库得以充分利用，实现仓储面积利用的最大化，减少仓储成本。

8. 绿色物流建设应该起始于产品设计阶段，以产品生命周期分析等技术提高产品整个生命周期环境绩效，在推动绿色物流建设上发挥先锋作用。

9. 绿色包装要醒目环保，还应符合 4R 要求，即少耗材（Reduction）、可再用（Reuse）、可回收（Reclaim）和可再循环（Recycle）。

10. 绿色物流的关键所在，不仅依赖绿色物流观念的树立、绿色物流经营的推行，而且离不开绿色物流技术的应用和开发。



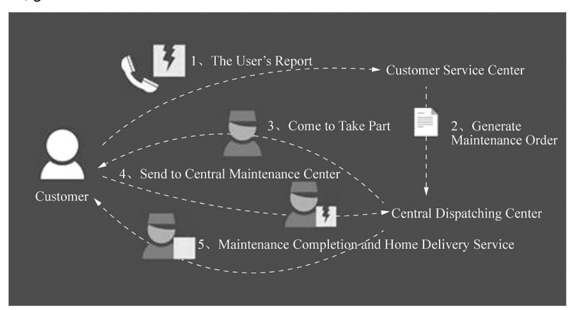
【参考视频】

Text B Reverse Logistics

Many organizations and individuals have tried to define **reverse logistics**. We refer to the term “reverse logistics” as all activity associated with a product/service after the point of sale, the ultimate goal to **optimize** or make more efficient aftermarket activity, thus saving money and environmental resources.

Reverse logistics **stands for** all operations related to the reuse of products and materials. It is “the process of planning, implementing, and controlling the efficient, cost effective flow of raw materials, in-process inventory, finished goods and related information from the point of consumption to the point of origin for the purpose of recapturing value or proper disposal. More precisely, reverse logistics is the process of moving goods from their typical final destination for the purpose of capturing value, or proper disposal. Remanufacturing and refurbishing activities also may be included in the definition of reverse logistics.” The reverse logistics process includes the management and the sale of surplus as well as returned equipment and machines from the hardware leasing business. Normally, logistics deal with events that bring the product towards the customer. In the case of reverse logistics, the resource goes at least one step back in the supply chain.[1] For

instance, goods move from the customer to the distributor or to the manufacturer.



Although reverse logistics has become a necessary business activity in almost all industries, most companies still concentrate their efforts on getting products out the door and to the customer .[2] The focal point of many contemporary supply chain logistics is sales and planning of the **outbound** process, from raw materials to manufacturing to final **consumption**. But firms are beginning to realize that reaching the final customer does not necessarily represent the end of the journey for a product.

Products flow backward after reaching their point of consumption for numerous reasons. A recent study reported that 51.65% of apparel companies agree to take back returned apparel because it is **defective** or it was damaged in shipment. Approximately 48% take back merchandise, not because it was defective, but because the wrong model or size was purchased. Other apparel companies report that they take back product in an effort to maintain customer satisfaction and loyalty as well as to create good will.

After considerable **trials** and **tribulations**, companies have developed some simple and effective strategies for setting up a successful reverse logistics process.

1. Security

Returns should be separated from items bound for distribution. One of the main reasons is related to security. It is recommended that the reverse logistics area be designed to have only one entry and exit point.[3]

Return items sent back by mail are often lost or misplaced, resulting in poor customer service because of delays in charge backs, **erosion** of the company's reputation and financial loss. If the budget allows—metal **detectors** and personal security agents can also **drastically** minimize the number of lost or misplaced returns.



2. Shipping and Receiving

A common problem is the unloading of returns at the incorrect location within the distribution center. In this returned products can block the flow of outgoing merchandise. The returns can also be mixed with new products waiting to be shipped out. It takes time to sort through the merchandise mix. Returns often have to be **manually** returned to the correct area. To avoid this complication, a separate mailing address should be assigned to the returns dock.

3. Labor

Returns inspection is considered to be the most complicated function performed in reverse logistics. Numerous requirements regarding the condition of the returned product have to be **accounted for** by the inspectors. Better educated, better trained, and highly motivated employees are necessary to fill the positions.

The work load involved with returns is **unpredictable**. It has been found that establishing a mix of full-time and hourly workers for handling returns is a successful way to handle **labor utilization**. One company found success by hiring all returns inspectors as full-time employees, and hiring support personnel to unload returns, palletize and distribute the returns to the inspection stations, and pick and pack the processed returns according to **disposition** options. The support personnel are hourly wage employees. The rationale is that it is much easier to hire additional support employees than returns inspectors because they are not as highly trained.

4. The Return Policy

Companies should have a clear policy format regarding returns. The policy should include basic return guidelines for return authorization information, return product **eligibility** requirements, return shipping guidelines, freight damage guidelines, and a general corporate policy regarding returns. The return policy should be carefully communicated to customers.

5. Inspect Returns

Return inspectors should practice a systematic process. It is beneficial for each inspector to have their own personal code to ensure strict and personal **accountability.** Products should contain electrical profiles with pertinent information such as the manufacturer's number, the product's serial number, invoice number, etc. . Inspection involves comparing the data with the physical condition of the product.

6. Assign Disposition

The task of deciding what will be done with processed returns is known as assigning disposition. There are three major disposition categories—sell at a discount on **secondary** markets; return to the manufacturer/supplier; and return to stock/sellable.

Selling at a discount on secondary markets entails selling products that are in good operational condition, but which are packed in containers that have been damaged and /or compromised or have the manufacturer's seal broken.

It is helpful to use the term "secondary" to distinguish the difference between returned products and new products. The term "secondary" indicates that they have already been sold as new and are now going back to the market for the second time. For some companies, website selling has been a successful venue to resell secondary products.

Return to manufacturer/supplier entails pushing returned product back to manufacturers / suppliers—because of the implications of direct cost this is considered the highest priority concerning disposition options. Does the product have to be factory sealed? Return to stock/sellable is the final option. These returns are considered new with the original manufacturer's seal intact. A return stock/sellable product is placed back in inventory and sold as new. This is the preferred option for manufacturers and suppliers, since returns transportation costs are avoided and valuable inventory space is preserved.

The obvious reason for neglecting to implement a **state-of-the-art** reverse logistics program is cost related. Companies are already hard pressed to cut costs—including logistics **expenditures**—to a minimum; dealing with returns is considered an unnecessary and costly effort. However, the cost of not dealing with returns can be extremely costly.

Liberal customer service policies, along with rapid product **obsolescence** resulting from ever-shortening product life cycles, have made product returns a daily headache for many retailers. Before returns begin building up in the distribution center, slowing down the supply chain and negatively affecting the bottom line, it is **prudent** to implement clear and **cogent** strategies which will ease the return process as well as build customer satisfaction.

【Key Words】

reverse logistics		循环型物流
optimize [ˈɔptimaiz]	*vt.*	使最优化，使尽可能有效
stand for		代表，表示；为……而奋斗；拥护
outbound [ˈautbaund]	*adj.*	开往外地的，开往外国的，向外的，出港的，离开某地的

consumption [kənˈsʌmpʃən] *n.* 消费，消耗

defective [diˈfektiv] *adj.* 有错误的，有缺陷的；不完美的，有缺点的

trial [ˈtraiəl] *n.* 审判，审理；测试，试验，考验；审问，审讯

tribulation [ˌtribjuˈleiʃən] *n.* 苦难，艰难；苦难的缘由，烦恼事

erosion [iˈrəuʒən] *n.* 腐蚀，侵蚀，磨损

detector [diˈtektə] *n.* 探测器，侦察器，检测器

drastically [drastikəli] *adv.* 大大地，彻底地；激烈地

manually [ˈmænjuəli] *adv.* 用手地，手工地

account for 说明（解释）……原因，证明；对……负有责任

unpredictable [ˈʌnpriˈdiktəbl] *adj.* 无法预言的；捉摸不透的，反复无常的

labor utilization 劳动力的使用

disposition [ˌdispəˈziʃən] *n.* 气质，天性，性格；安排，布置；倾向，意向

eligibility [ˌelidʒəˈbliti] *n.* 适任，合格；被选举资格

accountability [əˌkauntəˈbiliti] *n.* 有责任，有义务，可说明性；应作解释

secondary [ˈsekəndəri] *adj.* 次要的，次等的；中级的；中等教育的，中学的

state-of-the-art *n.* 艺术级的

adj. 最先进的，最高级的

expenditure [iksˈpenditʃə] *n.* 花费，使用；（尤指金钱的）支出额；（精力、时间、材料等的）耗费，消耗

liberal [ˈlibərəl] *n.* 宽容大度的人，宽容的人，开明的人；自由主义者

obsolescence [ˌɔbsəˈlesns] *n.* 废弃，陈旧过时；（器官的）废退

prudent [ˈpruːdənt] *adj.* 审慎的，有先见之明的，判断力强的

cogent [ˈkəudʒənt] *adj.* （理由、论据）有说服力的，令人信服的

【Notes to Text B】



【对应翻译】

[1] In the case of reverse, the resource goes at least one step back in the supply chain.

in the case of　在……情况下

区别：in case　以防，万一

[2] Although reverse logistics has become a necessary business activity in almost all industries, most companies still concentrate their efforts on getting products out the door and to the customer.

although… still…　尽管……仍然……

[3] It is recommended that the reverse logistics area be designed to have only one entry and exit point.

句式"it is recommended that …(should) be"表示虚拟语态。

【Exercises to Text B】

【参考答案】

Ⅰ. Choose the best answer.

1. Reverse logistics stands for all operations related to the ( ) of products and materials.

A. use B. reuse C. remove D. move

2. ( ) and refurbishing activities also may be included in the definition of reverse logistics.

A. Manufacturing B. Remanufacturing

C. Damaging D. Moving

3. In the case of reverse, the resource goes at least ( ) step back in the supply chain.

A. one B. two C. three D. four

4. Products flow backward after reaching their point of ( ) for numerous reasons.

A. distribution B. delivery C. warehousing D. consumption

5. After ( ) trials and tribulations, companies have developed some simple and effective strategies for setting up a successful reverse logistics process.

A. considerate B. considerable C. less D. few

6. Returns should be ( ) items bound for distribution.

A. added to B. related to C. separated from D. in addition to

7. The support ( ) are hourly wage employees.

A. personnel B. personal C. professional D. human

8. It is ( ) for each inspector to have their own personal code to ensure strict and personal accountability.

A. harmful B. important C. interesting D. beneficial

Ⅱ. Reading and answering questions.

Nowadays, most companies are familiar with the idea of "mission statement" as an expression of setting a vision for the business. The mission statement seeks to define the purpose of the business, its boundaries and its aspirations. It is now common for organizations to have such statement for the business as a whole and for key constituent components. What some companies have found is that there can be significant benefits to defining the logistics vision of the firm.

The purpose of the logistics vision statement is to give a clear indication which business intends to build a position of advantage through closer customer relationship. Such statement is never easy to construct. There is always the danger that they will publish the energetic and encouraging declaration that give everyone a warm feeling but provide no guideline for action.

Ideally the logistics vision should be built around the simple issue of "How do we intend to use logistics and supply chain management to create value for our customers?" To realize this idea will necessitate a detailed understanding of how customer value is created and delivered in the market in which the business competes. Value chain analysis will be a fundamental element in this investigation as will the definition of the core competencies and capabilities of the organization. Asking the question "What activities do we excel in?" and "What is it that differentiates us from our competitors?" Is the starting point for creating the logistics vision statement?

Earlier, it was suggested that the three words "Better, Faster, Cheaper" summarizes the ways in which logistics vision statement can provide value for customers. The criterion for good logistics vision statement is that it should provide the road map for how these three goals are to be achieved.

Questions:

1. What does mission statement intend to do? (　　)

A. To please management

B. To define, summarize and achieve a common goal

C. To achieve higher market share and profitability

D. To develop new market

2. What kind of goals can mission statement fail to achieve? (　　)

A. Fail to provide realistic guidelines to guide the actions to achieve results

B. Fail to design a goal that everyone agrees

C. Fail to point out a good goal

D. Fail to implement effectively

3. Which element should a logistics mission statement focus on? (　　)

A. transportation　　B. costs

C. customers　　D. punctuality

4. How should a logistics vision statement add value to its customers? (　　)

A. To provide cheaper services

B. To provide more choices for transportation

C. To communicate better with customers

D. To provide better, more cost-effective and punctual services

5. What should a logistics mission statement provide? (　　)

A. Management encouragement

B. A design of new methods to apply to customer satisfaction

C. Some detailed actions to undertake to obtain more market share

D. An outline of actions for goals to be achieved



Reading Material

A Blueprint for Green Logistics

Although the environment is not a major **preoccupation** or priority in the industry itself, reverse distribution has opened up new market possibilities based upon growing societal

concerns over waste disposal and recycling. Here the environmental benefits are derived rather than direct. The transportation industry itself does not present a greener face, indeed in a literal sense reverse logistics adds further to the traffic load. The manufacturers and domestic waste producers are the ones achieving the environmental credit. Pressures are mounting from a number of directions that are moving all actors and sectors in the economy in the direction of increasing regard for the environment. In some sectors this is already manifest, in others, such as the logistics industry, it is latent. The issue is when and in what form it will be realized. Three scenarios are possible. While not mutually exclusive, they each present different approaches and implications:

(1) A top-down approach where "greenness" is imposed on the logistic industry by government policies.

(2) A bottom-up approach where environmental improvements are coming from the industry itself.

(3) A compromise between the government and industry, notably through certification.

First is that government action will force a green agenda on the industry, in a top-down approach. Although this the least desirable outcome for the logistics industry, it is already evident that government intervention and legislation are reaching ever more directly over environmental issues. In Europe there is a growing interest in charging for external costs, as the EU moves towards a "fair and efficient" pricing policy. A sharp increase in costs could have a more serious impact than a more gradual, phased-in tax. In North America there is a growing interest in road pricing, with the re-appearance of tolls on new highways and bridges built by the private sector, and by congestion pricing, especially in metropolitan areas.



Pricing is only one aspect of government intervention. Legislation controlling the movement of hazardous goods, reducing packaging waste, stipulating the recycled content of products, the mandatory collection and recycling of products are already evident in most jurisdictions. Indeed, it is such legislation that has given rise to the reverse logistics industry. Truck safety, driver education, limits on driver's time at the wheel, are among many types of government action with a potential to impact the logistics industry.



A difficulty with government intervention is that the outcomes are often unpredictable, and in an industry as complex as logistics, many could be unexpected and unwanted. Environmentally- inspired policies may impact on freight and passenger traffic differentially, just as different modes may experience widely variable results of a common regulation. Issues concerning the greenness of logistics extend beyond transport regulations. The sitting of terminals and warehouses are crucial to moving the industry towards the goal of sustainability, yet these are often under the land use and zoning control of lower levels of government whose environmental interests may be at variance with national and international bodies.

If a top-down approach appears **inevitable**, in some respects at least, a bottom-up solution would be the industry preference. Its leaders oppose leaving the future direction to be shaped by government action. There are several ways a bottom-up approach might come about. As with reverse logistics, these occur when the business interests of the industry match the imperatives of the environment. One such match is the concern of the logistics industry with empty moves. With the growing sophistication of fleet management and IT control over scheduling and routing, further gains are achievable.

Less predictable, but with a much greater potential impact on the greenness of the industry, are possible **attitudinal** changes within logistics and without. These changes are comparable of that which has already occurred in recycling. There has emerged striking public support for domestic recycling. This has been extended by some firms in successfully marketing their compliance and adoption of green strategies. Firms have found that by advertising their friendliness towards the environment and their compliance with environmental standards, they can obtain an edge in the marketplace over their competitors. Traditionally, price and quality characteristics formed the basis of choice, but because environment preservation is seen as desirable in general, greenness can become a competitive advantage. Ultimately, pressure from within the industry can lead to greater environmental awareness and respect. Companies that stand apart will lose out because purchasers will demand environmental compliance.

Somewhere between the bottom-up and top-down approaches are the moves being implemented with environmental management systems. Although governments are involved in varying degrees, a number of voluntary systems are in place, notably ISO 14000 and EMAS (Environmental Management and Audit System). In these systems firms receive certification on the basis of establishing an environmental quality control tailored to that firm, and the setting up of environmental monitoring and accounting procedures. Obtaining certification is seen as evidence of the firm's commitment to the environment, and is frequently used as a public relations, marketing, and government relations advantage. This represents a fundamental commitment of the corporation to engage in environmental assessment and audit that represent a significant modification of traditional practices, in which efficiency, quality and cost evaluations **prevailed**.

It can be argued that the paradoxes of green logistics make it impossible for the logistics industry to become significantly greener. The internal inconsistencies between the goal of environmental sustainability and an industry that gives undue preference to road and air

transport can be seen as being irreconcilable. Yet internal and external pressures promoting a more environmentally-friendly logistics industry appear to be inexorable. Of the three possible directions by which a greener logistics industry may emerge, it is realistic to consider that they will concomitantly help shape the industry of the future.

【Key Words】

preoccupation [priˌɒkjuˈpeiʃn]	*n.*	全神贯注，入神；当务之急；使人全神贯注的事物；偏见
legislation [ˌledʒisˈleiʃn]	*n.*	立法，制定法律；法律，法规
jurisdiction [ˌdʒʊərisˈdikʃn]	*n.*	司法权；管辖权；管辖范围；权限
inevitable [inˈevitəbl]	*adj.*	不可避免的；必然发生的
attitudinal [ˌætiˈtjuːdinl]	*adj.*	态度的，根据（或表示）个人态度的
prevail [priˈveil]	*vi.*	流行，盛行；获胜，占优势；说服，劝说
inexorable [inˈeksərəbl]	*adj.*	无情的，铁面无私的；不可动摇的，不屈不挠的

【Questions】

1. How many approaches are mentioned in the passage? What are they?
2. In your opinion, which approach in question 1 is the best?

参考译文

第8章 绿色物流

案例分析

诺基亚的绿色物流

在诺基亚，我们对环境影响负责并采用生命周期作为环境工作的框架思路。我们衡量物流对环境的影响，包括工厂到客户的货物运输，从供应商到生产基地的运输部分，并采取相关的物流回收和回收可再利用的废旧电子设备。诺基亚把所有的物流活动外包给各种物流服务供应商。

诺基亚正致力于降低二氧化碳的排放量以达到既定目标的进程中，并为成为符合 2012 年低碳标准的物流供应商而努力。（诺基亚）所采取的行动迄今涉及销售包装、运输效率、网络优化、规划、研究和使用其他交通方式，销售和运输包装材料的使用效率。我们将在未来积极发展这些领域。

自 2006 年以来，我们一直在减小包装尺寸，这使我们至少节省了 12 000 辆货车。我们正在进行运输材料发展项目和试行新的解决方案。

我们成功地使用其他运输方式来代替空运货物，把部分交通量转移到海运。将来越来越多的海上、公路和铁路运输也将取代空中运输。我们在优化物流网络时，除了考虑成本和客户服务，还有能力考虑二氧化碳排放。我们和物流服务供应商紧密合作，推行环保措施，感谢所有的绿色思想和物流行业的倡议。我们可以把这些革新进一步推广到不仅是诺基亚公司，而且还有各个行业的工作里。

诺基亚的物流网络是非常广大的。我们侧重于努力改进方法和计算诺基亚物流产生的二氧化碳排放量的能力，以使其尽可能准确。这使我们能够跟踪改进措施的影响，并确保我们实现减排目标。二氧化碳的计算是基于一段（线）基础距离、排放系数和产品的重量。排放系数取决于交通方式、车辆类型和负载系数。我们需要进行精确的计算，还要与物流服务供应商密切地合作，以获得这些数据。通过加入温室气体议定书（GHG Protocol）的标准化工作组，诺基亚还致力于物流行业二氧化碳影响的计算标准。

Text A

绿 色 物 流

21 世纪最大的斗争之一是企业与可持续发展，而解决它的方案是绿色物流。在意识到环境问题的世界中，企业发现改善环境影响力是有益处的。当它们努力承担从生产、配送到消耗的责任时，就实施了绿色物流。

绿色物流侧重于材料处理、废物管理、包装和运输。逆向物流（详见 Text B）这个术语有时可以与绿色物流互换，因为它的意思是指把材料成功运到目的地后再循环和再利用。

绿色物流的主要目标是按对环境“最低消耗”方式来满足受益人需求而协调供应链各环节。这是逆向物流的主要要素。以前“成本”是纯粹的货币计量，而现在的“成本”被理解为外部的物流成本，与天气变化、空气污染、倾倒废物（包括包装废物）、土壤损坏、噪声、震动和事故有关。

绿色或可持续性的物流关注减少环境和其他与供应运输有关的负面影响。可持续性发展追求的是确保今天做的决定不要对后代产生不利影响。绿色供应链追求的是通过重新设计采购、配送系统和管理逆向物流减少负面影响，来去除无效和不必要的货运和包装的倾倒。

包装是物流让环境承受巨大风险的好例子。包装是环保型物流最大挑战的之一，同时对运送和储存很重要。

包装正确与否关乎储存产品的价值，如何储存或者运送到指定地点。如果包装阻碍了储存空间最优化，那么单个成本就会增加。一些行业已经发展了满足运输包装要求的包装形式，但并不解释包装返还到原始地的费用。这种包装只用一次被丢弃。单个听装和食物纸盒一直按这个原则贯彻下去。

包装类型对物流人员来说是最大的挑战，因为回收、再利用和有效处理包装日益成为供货商和卖方的责任。

目前有一些公司在应用绿色物流，如：

（1）士普利（Shiply）——它是一家英国公司，认为目前将货物送到住所的方式是浪费的观念。该公司配对了往返车，而不是空车来接新单。

（2）敦豪速递公司（DHL）——这家有名的速递公司提供GOGREEN项目来追踪用DHL运送商品时二氧化碳排放量。这样，该公司可明智地决策怎样最大减少二氧化碳排放量。

（3）联邦快递（FedEx）——自2010年，联邦快递就承诺关注绿色物流。该公司一直通过增加电力和混合动力的卡车车队利用可持续能量。

这些公司通过环保业务逐步来省钱和吸引想支持可持续性的客户。公司可采取简单的步骤来执行绿色物流：

（1）减少包装大小。许多公司研发减少包装材料的数量。

（2）改变运输方式。铁路和水上运输比卡车运输更加环保。

（3）减少配送运输距离。自2010年起，重型卡车货运占美国石油使用量的17%。通过和北美货运效率委员会的合作，可以减少运费成本和距离。

（4）教授司机环保技术，例如通过增加右转减少左转来减少路上时间。

（5）集中仓储和优化效率。仓库越大，能耗越高，而库存水平越低，能耗越少（如供暖、冷藏和照明等）。仓库里改用LED灯可减少电力成本。

通过采取以上步骤可以使你的公司居于绿色物流领先者，你不仅可以省钱和获得市场优势，而且可以预见未来的环境规定。更重要的是，你可以创造可持续性业务，在不断变化的世界里繁荣发展。

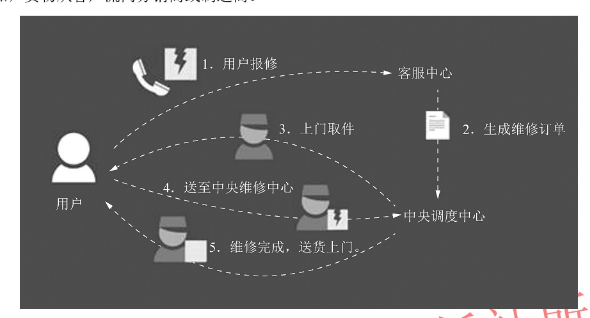
Text B

逆 向 物 流

许多组织和个人都试图界定逆向物流。我们指的“逆向物流”是与产品或服务有关的所有售后活动，最终目标是优化或进行更有效的售后活动，从而节省资金和环境资源。

逆向物流指与产品和材料再利用相关的所有操作。它是“为再获得价值或处置合理而对原材料、在制品库存、成品及相关信息从消费点到起始点的有效流动所进行的计划、执行和控制效率的过程。更准确地说，逆向物流就是为了价值的获取或适当的处置，把货物从最终象征性目的地运送的过程。逆向物流还包括再制造和翻新活动。”逆向物流的过程包括管理、

销售剩余物和从硬件租赁业务中返回的设备和机器。通常情况下，物流就是处理产品向客户流动过程中发生的各类事件。而在逆向物流过程中，资源在供应链中至少有一次回头过程，例如，货物从客户流向分销商或制造商。



尽管逆向物流已成为几乎所有行业必需的业务活动，但大多数企业仍集中精力于将产品销售给客户。许多现代物流供应链的重点是销售和计划外游的过程，从原料到生产到最终消费。但是，很多公司都开始意识到，到达最终用户并不一定代表一个产品的旅程结束。

产品到达消费者后回流的原因很多。最近的一项研究报告显示，51.65%的服装公司同意收回的服装退货是因为它有缺陷，或者在运输中损坏。大约 48%的收回商品，不是因为它有缺陷，而是因为消费者购买了错误的型号或尺寸。其他服装公司报告说，它们收回产品，是为了努力保持客户满意度和忠诚度，以及创造良好的意愿。

经过考验和艰难，许多公司已经制定了简单有效的战略来建立一个成功的逆向物流程序。

1．安全

应与待售品中分离，其中一个主要原因与安全有关。有人建议，逆向物流区应设计为只有一个入口和出口。

邮寄退回的物品常常被丢失或被投错，这导致客户服务质量差，因为返回费用被延误，会使公司声誉和经济受损。如果预算允许——使用金属探测器和个人安全代理可以大大减少丢失或错投数目。

2．运送和接收

一个常见的问题是，配送中心把退货卸载到不正确的位置。在这种情况下，退货可能阻挡即将离开的商品流。还有可能就是，返回品返回时会与等候的新产品混在一起被运走。这需要时间来对商品进行分类组合，而退货常常需要手工操作才能回到正确的地区。所以为了避免复杂化，应分配单独的邮件地址用来退货。

3．劳动力

检查被认为是逆向物流执行中最复杂的功能，而退货的状况和许多要求必须由检验人员负责。所以，只有受到更好的教育、更好的培训和充满活力的员工才能胜任该职位。

退货涉及的工作量是不可预测的。据发现，专职人员和小时工混合使用来处理退货是利



用劳动力的一个成功方法。一家公司发现的成功案例是，雇用全职员工为产品员，聘用辅助人员卸下退货、堆垛和分发到检查站，按照处置方案挑选和包装来处理退货。辅助人员是按小时付工资的雇员。这样做的理由是雇用额外的辅助人员比雇用检验人员更容易，因为他们不需要太多的培训。

4．退货政策

企业应该有一个关于退货的明确政策。该政策应包括退货授权信息、退货资格要求、退货装运指南、货运损坏指标和关于退货的公司总政策。应该把退货政策认真传达给客户。

5．检查退货

退货检验员需要系统过程的实践。每个检验员有自己的个人密码，以确保严格的个人职责。产品应带有含相关信息的电子档案，如制造商的编号、产品序列号、发票号码等相关信息，因为检查涉及将电子数据与产品实际状况比对。

6．分配处置

决定如何处理退货的任务就是分派处置。3 个主要的处置类别是：打折卖给二级市场；退给制造商/供应商；退到仓库/卖方。

在二级市场上打折销售的产品根据市场需要经营状况良好，但包装容器可能已损坏，或制造商的封条被破坏。

用“二次的”来分清退货和新产品的区别是有用的。“二次的”一词表明，它们已作为新的产品被销售过，而现在进行第二次重返市场。对于一些公司来说，网站销售一直是再售二次产品的成功平台。

返回到制造商/供应商需要把退货推给制造商/供应商——由于受直接成本的影响，这是最优先考虑的处置方案。（返回）产品是否必须原装吗？返回仓库/销售是最后的选择。只要这些退货的原厂印章完好无损，就被认为是新的。将回收的库存/被销售的产品放回仓库，然后再像新的产品一样卖掉。因为要减少退货的运输成本和保留宝贵的存货空间，所以这就是制造商和供应商的首选方案。

实施最先进的逆向物流被忽视的原因与计划成本有关。很多公司已经很难削减成本（包括物流成本支出），已到了最低限度；处理退货被认为是不必要的和昂贵的努力。然而，不处理退货，成本将更加昂贵。

自由的客户服务政策和由日益缩短的产品生命周期造成的产品迅速老化，导致产品退回已是许多零售商每日头痛的问题。在产品返回之前开始建设配送中心，可减缓供应链和产生不利影响的底线，谨慎的做法是实行明确和有力的战略，将缓解返回进程，以及建立客户满意度。

阅读材料

绿色物流蓝图

虽然环境在行业中不是当务之急或优先考虑的问题，但是逆向配送可能已在越来越受社会关注的回收利用和废物处置基础上开辟了新市场。环境的益处是衍生的而不是直接的。交通运输业本身并没表现得更环保，事实上逆向物流进一步增加了交通负荷。制造商和国内废品生产商已获得了环境信用度。来自多方面的压力把经济实体中所有行动者和部门往不断增加的环境方向推动。这在一些部门已经体现，而在其他行业，如物流，还是潜在的问题。问

题是何时以何种形式得以实现。有 3 种方案可以执行。当相互不排斥时，它们都提出不同的方法和意义：

（1）通过自上而下的方式，也就是“环保”通过政府政策强加给物流业。

（2）通过自下而上的方式，也就是来自行业本身的环境改善。

（3）特别是通过政府和行业之间认证进行妥协。

首先是政府通过自上而下的方式强制行业执行环保议程。虽然这对物流业会产生最不理想的后果，但是很明显，政府干预和立法能更直接地解决环境问题。因为欧盟走向了“合理高效”的定价政策，所以欧洲外部成本收费利息不断增长。成本大幅增加可能对渐进的、分阶段的税款产生更严重的影响。在北美，特别是在大城市，通过私人部门和拥堵费建立新的高速公路和桥梁而重现的通行费，使公路收费产生越来越大的利益。

价格只是政府干预的一个方面。立法可控制危险货物的流动，减少包装废弃物，规定产品回收的内容，收集和强制回收的产品，这在大多数地区已经很明显体现。实际上，这种立法引起逆向物流业的增加。汽车安全、驾驶员教育、车轮上的驱动程序时间限制，这些许多类型的政府行动对物流业产生了潜在的影响。

政府干预的困难是后果往往不可预测，并且复杂的物流作为一个行业，可能会产生很多意外和多余的事情。环保激励政策可能影响货运和客运量的差异，就像不同的模式可能会遇到共同监管而导致很大的差别。有关绿色物流的问题已超越了交通法规。站点和仓库对实现可持续发展的产业目标是至关重要的，但这些往往是在土地使用和下级政府的分区控制下所产生的环境利益，可能导致国家和国际机构的变异。

如果不可避免使用自上而下的方法，至少在某些方面自下而上的解决方法更受行业喜欢。其领导人反对让政府行为成为未来的行动方向。可能有几种自下而上的方法。如同逆向物流，在商业利益与环境需要相匹配的时候使用这些方法。这样的匹配是物流业空箱运输所要关注的。随着车队管理日趋复杂，信息技术控制调度和道路，可以进一步获取收益。

较难预测的是，绿色行业更大的潜在影响可能是物流态度有无变化。这些变化与再循环中发生的变化不相上下。目前国内再循环明显受到公众支持。这被一些公司衍生为成功地使绿色战略的承诺和采用市场化。公司发现，通过宣传其对环保和环境标准的遵守，它们能超越竞争对手得到市场优势。传统上，价格和质量特性形成选择基础，但是因为保护环境一般是有必要的，所以环保可以成为竞争优势。最终，行业内部的压力可能会导致更大的环境意识和尊重。因为买家会要求符合环保承诺，不环保的公司将被淘汰出局。

介于自下而上和自上而下的办法是实施环境管理系统的举措。虽然各国政府都在不同程度上参与，但是很多无偿系统已到位，特别是 ISO 14000 和 EMAS 的（环境管理和审计系统）。在这些系统中，公司在建立环境质量控制适当调整基础上获得认证，并且建立环境监测和会计程序。获得认证被看作是公司对环境承诺的证据，并经常作为公共关系、市场营销和政府关系的优势。这代表了该公司进行环境评估和审计评价的基本承诺，也代表了在效率、质量和成本上传统做法的重大修改。

可以认为，绿色物流的博弈使物流业更环保的可能性变大。不可调和的是环境持续性的目标和过度优先给航空和道路运输行业不一致。然而，内部和外部的压力必然推动物流业更环保。更环保的物流业会按 3 个可能的方向发展，它们将不断帮助塑造未来产业。



Chapter 9

Integrated Logistics



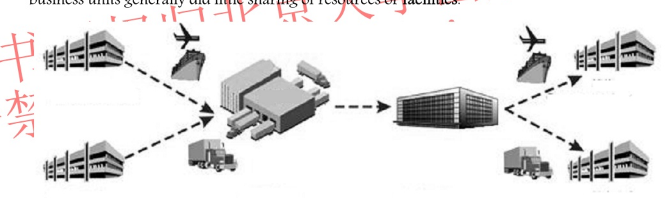
Case Study

Supply Chain Integration Becomes a Reality

Customer-focused supply chains that can better **align** and link the various firms making up the supply chain are increasingly likely to gain **competitive advantage**. This can be **exemplified** by Wal-Mart, Dell, and IBM examples. Supply chain **integration** with agreement on goals, business strategies, and **information transparency** can have **significant impacts** on capacity investment, inventories, design, responsiveness, and support of a firm's worldwide product/service development, operations/manufacturing, and sourcing footprints.

An example, discussed here in more detail, is the Motorola supply chain integration. In 2005, Motorola undertook the task of linking the various elements that make up its supply chains worldwide. The objectives were cost, cash, and customer service. Cost competitiveness would enable competitive pricing, cash would enable business investment, and customer service would enable the **retention** of customers.

The challenge was significant, as Motorola operates worldwide. Sales **spanned** all regions of the globe and purchases came from suppliers in 47 countries (as of 2004), and in the past the six business units generally did little sharing of resources or **facilities**.



To achieve transformation to an integrated supply chain, the focus was to align and link product design, **procurement**, manufacturing, logistics, and customer service. In addition, the following six key steps provide a high-level process approach to implement the change:

(1) Identify best-in-class processes for **duplication** throughout the company.

(2) Develop a supply base that has been right-sized and improve working relationships with key suppliers.

(3) Establish **clear-cut** supplier quality expectations and provide performance feedback via a **performance scorecard**.

(4) Establish most effective and efficient manufacturing and logistics operations.

(5) Focus information technology improvement projects to maximize the impact across all business units.

(6) Create an **action-oriented** and **results-driven** culture.

The results of the transformation by 2007 were dramatic. Examples are the following:

(1) Various teams identified best-in-class practices and the highest-priority practices were implemented worldwide.

(2) Business units work collaboratively to solicit quotes and award business.

(3) Suppliers were required to develop "quality renewal plans" to continue to do work with Motorola, and Motorola provided performance data to suppliers.

(4) Motorola's manufacturing and distribution operations square footage was reduced by 40% by examining its worldwide footprint and consolidating facilities.

(5) Ninety percent of Motorola's information technology spend is now on systems that are common and help all business units—not just one.

(6)In addition, a number of achievements as of year-end 2006 include reduced ppm defects from suppliers by 50%; achieved customer on-time deliveries of 85% to 92% at some business units (up from 30% to 40%); improved material expenses, product quality, and manufacturing efficiency by 40%; and achieved an 18% improvement in inventory turns.



Outline

Overall, this example suggests that a focused effort on integrating the vertical or functional silos into a more integrated supply chain(s) can produce performance results. This supply chain integration is a major ongoing challenge and will be the focus of future efforts.

【Key Words】

align [ə'lain]	*vi.*	排列；排成一行
	vt.	使结盟；使成一行；匹配
competitive advantage		竞争优势，比较优势
exemplify [ig'zemplifai; eg-]	*vt.*	例证；例示
integration [inti'greiʃ(ə)n]	*n.*	集成；综合
information transparency		信息透明
significant impact		重大影响
retention [ri'tenʃ(ə)n]	*n.*	保留；扣留，滞留；记忆力
span [spæn]	*n.*	跨度，跨距；范围
	vt.	跨越；持续；以手指测量
facilities [fə'silitiz]	*n.*	设施；工具，设备
procurement [prə'kjʊəmənt]	*n.*	采购；获得，取得
duplication [dju:pli'keiʃn]	*n.*	复制；副本；成倍
clear-cut ['kliə'kʌt]	*adj.*	清晰的；轮廓鲜明的，鲜明的
performance scorecard		绩效记分卡
action-oriented		以行动为导向的
result-driven		结果驱动的；以结果为导向的



Text A Integrated Logistics



【参考视频】

Integrated logistics is **defined** as the process of **anticipating** customer needs and wants; **acquiring** the **capital**, materials, people, technologies, and information necessary to meet those needs and wants; **optimizing** the goods or service—producing a network to **fulfill** customer requests; and utilizing the network to fulfill customer requests in a timely way.[1]

Integration has been one of the development of logistics management. This development began around 40 years ago at a **local** level. Today, many businesses are making **efforts** to integrate global supply networks, comprise several tiers of supplier and distributor, and use different transport modes and carries.[2]

Basically, the integrated international logistics management concept refers to administering the various activities as an integrated system. In firms that have not adopted a systems approach, logistics is often a **fragmented** and **uncoordinated** set of activities spread throughout various organizational functions, with each individual function having its own budget, set of priorities, and measurement system.[3]



A number of firms, such as Herman Miller, 3M, and Whirlpool Corporation, have found that total logistics costs can be reduced by integrating such logistic-related activities as customer service, transportation, warehousing, inventory management, order processing and information systems, and production planning and purchasing.

The performance of international logistics could be complex and

roundabout. For example, one firm buys the raw silk in China, weaves it in Republic of Korea, prints it in Italy and sells it in the United States market.

The payment from the buyer to the seller causes the flow of paperwork with the goods flowing. The international logistics means a system in which documentation flows are as much a part of the main logistical flow as flows of goods. The transaction channel handles contracting and trading, whereas the logistics channel deals with the physical movement of goods. The channels are separated from each other, that is, a firm may locate sales offices in a different set of cities than where it locates distribution center. However, the two channels are linked to the extent that sales, or payments, release of goods to the buyer.

The integration of international logistics can improve the international flow of inventory, international transport and warehouse asset utilization, and often eliminates the **duplication** of effort.[4] For example, rather than having the purchasing department negotiate with inbound carriers and the logistics department negotiate with outbound carriers, one organization can negotiate for both inbound and outbound transportation. The central **coordination** of the various logistics activities forces cost **trade-offs** to be made between and among logistics activities such as customer service, transportation, warehousing, inventory management, order processing, product planning, and purchasing.

【Key Words】

integrated [ˈintigreitid]	*adj.*	综合的，完整的，一体化的
define [diˈfain]	*vt.*	精确地解释；界定；规定，确定
	vi.	给（词、短语等）下定义；构成释义
anticipate [ænˈtisipeit]	*vt.*	预期，期望，过早使用，占先
	vi.	预订，预见
acquire [əˈkwaiə]	*vt.*	获得，学到
capital [ˈkæpitl]	*n.*	首都，首府
	adj.	首都的；重要的
optimize [ˈɔptəˌmaiz]	*vt.*	使最优化
fulfill [fulˈfil]	*vt.*	履行，实现，完成（计划等）
local [ˈləukəl]	*adj.*	地方的，当地的，局部的，乡土的
	n.	当地居民；本地新闻；慢车；局部
effort [ˈefət]	*n.*	努力，成就
fragmented [frægˈmentidˌ]	*adj.*	碎片的，片断的
uncoordinated [ˌʌnkoˈɔrdnˌetid]	*adj.*	不协调的
roundabout [ˌʌnkoˈɔrdnˌetid]	*adj.*	不协调的
duplication [ˌdupliˈkeʃən]	*n.*	复制，重复；复本；成倍，成双
coordination [koˌɔrdnˈeʃən]	*n.*	协调，和谐
trade-off		交易，折中

【Notes to Text A】


【对应翻译】

[1] Integrated logistics is defined as the process of anticipating customer needs and wants; acquiring the capital, materials, people, technologies, and information necessary to meet those needs and wants; optimizing the goods or service—producing a network to fulfill customer requests; and utilizing the network to fulfill customer requests in a timely way.

对某事物下定义时，一般用被动语态，如“sth. is defined as…”。在本句中出现了 5 个动名词结构短语，这是因为这些动词都落在了介词“of”的后面，变成名词短语而非独立句子。

[2] This development began around 40 years ago at a local level. Today, many businesses are making efforts to integrate global supply networks, comprise several tiers of supplier and distributor, and use different transport modes and carries.

“to integrate…, comprise…, and use…”是不定式的一种，“to”后面接多个并列的动词原形。

[3] In firms that have not adopted a systems approach, logistics is often a fragmented and uncoordinated set of activities spread throughout various organizational functions, with each individual function having its own budget, set of priorities, and measurement system.

“with each individual function having its own budget, set of priorities, and measurement system.”起“with”结构的副词作用，形式是“with+宾语+现在分词或短语”。

[4] The integration of international logistics can improve the international flow of inventory, international transport and warehouse asset utilization, and often eliminates the duplication of effort.

介词短语“of”后面可接多个并列的名词，如“inventory”“international transport”和“warehouse asset utilization”等。

【Exercises to Text A】


【参考答案】

I. Fill in the blanks.

1. The movement of ______________ and _______ to a manufacturing company must be managed.

2. Integrated logistics is a ________ process.

3. The performance of international logistics could be _____________________.

4. However, the two channels are linked to the extent that sales, or , ____________ of goods to the buyer.

5. The integration of international logistics can improve the international flow of __________, international transport and warehouse asset utilization, and often eliminates the ________ of effort.

Ⅱ. True of false.

1. Production lines sit idle if integrated logistics succeeds in transporting parts and raw materials into the plant. ( )

2. Operations need not produce goods if they can move efficiently and effectively to the market. ( )

3. Integrated logistics is more important than marketing or production. ( )

4. Integrated logistics requires goods to move, and it is useful to move goods that can be used or sold. ( )

5. Storing and protecting stopped goods incur cost with adding value. ( )

Ⅲ. Translation.

1．交易双方处理合同和贸易，与此同时物流部门处理货物的流转。

2．一体化已成为物流管理发展的重要主题。

3．国际物流的发展需要对各自分散的功能要素进行整合。

4．国际物流中的整合能够提高存货的国际流转、国际运输和仓储资产利用程度。

5．良好的国际物流系统能使跨国公司获得巨大的经济利益。



Text B The Integrated Model of FedEx Corporation



【参考视频】

FedEx Corporation is a US $20 billion market leader in transportation, information, and logistics solutions, providing strategic direction to six main operating companies.[1] These are FedEx Express, FedEx Ground, FedEx Freight, FedEx Custom Critical, FedEx Trade Networks, and FedEx Services.

Prior to the purchase of the ground, freight, and other **non-express-based** services, Federal Express had reorganized all of its major **indirect spend** in information technology, aircraft, facilities/business services, vehicles/fuel/ground service equipment, and supply chain logistics groups under the Strategic Sourcing and Supply group, led by Edith Kelly Green.



After the purchase of these different businesses, the supply management function was reorganized into a **center-led** supply chain management (SCM) sourcing model[2] ("center" refers to a Center of Excellence that focuses on centralizing sourcing strategy teams).

Over the last two years, FedEx Supply Chain Management has been focusing on leveraging sourcing and contracting for all of the FedEx family of companies.[3] For office supplies, instead of having each company run a contract, SCM has a single corporate contract for all of the **negotiation** effort that allows for different **transactional** approaches.

It has been a gradual **migration** to a centralized view of how **procurement** happens. It is central for the larger spend areas and different policy requirements. FedEx established a seven-step sourcing process as followings：

Step 1: A user provides a requisition for an item. When the user provides the requisition, the sourcing **specialist** or team must establish whether it is worth putting a strategy around it. This is typically done using a **return-on-investment criterion**: is the spend large enough to put a **significant** amount of time into sourcing the product through a **full-blown** supplier evaluation?[4] For example, if the requisition is for something that turns out to be a US $200,000 per year spend, the payback on it may not be worth the resources required to do a full supplier **evaluation** and selection process. However, if the spend is large enough, the team will conduct an assessment of the category that **profiles** that industry and commodity. This **assessment** involves researching the nature of existing purchasing activity: how much is it, who is it with, and what are the issues with existing suppliers? If it is not large enough, the user may be directed to a simple purchase order and invoice through the Ariba system.

Step 2: Assuming a large spend, based on research conducted in Step 1, the team goes into a process to select the sourcing strategy, **in essence** taking all of the information it has and deciding how it will approach that marketplace. Is a request for proposal appropriate? Does it need to maintain existing relationships or revisit negotiation and develop a strategy regarding the sourcing strategy?

Step 3: Assuming it is going beyond a negotiation, the team must conduct in-depth research with suppliers in that area, including qualification of the suppliers. Can the suppliers satisfy user requirements, service aspects, and so on? The end goal is to develop a list of suppliers to send RFPs⑭. The team conducts a supplier portfolio analysis.

Step 4: Another phase of this implementation pass is to revisit this strategy and have the team take another look at it. Has it uncovered something that will cause it to change negotiation? The team develops a strategy for negotiation, does it want to use a reverse

⑭ RFPs　RFP 是 Request for Proposal 的缩写，即建议请求、意见书。RFPs 是 RFP 的复数形式。

auction or use a conventional RFP, as well as criteria for supplier evaluation? Is this still something it wants to do? If so, it proceeds with the RFP to the selected suppliers.

Step 5: After receiving RFPs, the team conducts the supplier selection and negotiation process.

Step 6: Once the team has made the selection, it needs to do the integration. This is done by applying the Ariba toolset with the supplier and identifying integration **conflicts** to be resolved to make the contract workable.

Step 7: The final stage in this process is to benchmark the supply market by monitoring the supplier(s) through the FedEx Supplier **Scorecard** system.

【Key Words】

prior to　　在……之前
non-express-based　　非快递基础上
indirect spend　　间接费用
center-led　　中央集权
negotiation [nigəuʃiˈeiʃ(ə)n]　*n.*　谈判；转让；顺利通过
transactional　*adj.*　交易型的；事务性的；事务处理的
migration [maiˈgreiʃ(ə)n]　*n.*　迁移；移民；移动
procurement [prəˈkjʊəmənt]　*n.*　采购；获得，取得
specialist [ˈspeʃ(ə)list]　*n.*　专家；专门医师
　adj.　专家的；专业的
return-on-investment　　投资收益
criterion [kraiˈtiəriən]　*n.*　（批评判断的）标准；准则；规范；准据
significant [sigˈnifik(ə)nt]　*adj.*　重大的；有效的；有意义的
　n.　象征；有意义的事物
full-blown [fulˈbləun]　*adj.*　成熟的；（花）盛开的；（帆等）张满的
evaluation [iˌvæljʊˈeiʃ(ə)n]　*n.*　评价；评估；估价；求值
profiles [ˈprofail]　*n.*　配置文件；剖面图；个人档案
　v.　扼要描述；给出轮廓；隐蔽行动
assessment [əˈsesmənt]　*n.*　评定；估价
in essence　　本质上
conflict [ˈkɒnflikts]　*n.*　冲突；矛盾；斗争
　v.　抵触；战斗
scorecard [ˈskɔːkɑːd]　*n.*　记分卡，平衡计分卡



【对应翻译】

【Notes to Text B】

[1] FedEx Corporation is a US $20 billion market leader in transportation, information, and logistics solutions, providing strategic direction to six main operating companies.

"providing strategic direction to six main operating companies"是现在分词短语作定语，修饰前面的宾语"market leader"。

[2] After the purchase of these different businesses, the supply management function was reorganized into a center-led supply chain management (SCM) sourcing model.

"was reorganized into"是被动语态的过去时，表示被动形式。

[3] Over the last two years, FedEx Supply Chain Management has been focusing on leveraging sourcing and contracting for all of the FedEx family of companies.

"leveraging sourcing and contracting for…"是现在分词短语作宾语。

[4] This is typically done using a return-on-investment criterion: is the spend large enough to put a significant amount of time into sourcing the product through a full-blown supplier evaluation?

"return-on-investment""full-blown"都是复合词。



【参考答案】

【Exercises to Text B】

Ⅰ. Fill in the blanks.

1. FedEx Corporation is a US $20 billion ________ in transportation, information, and logistics solutions, providing strategic direction to six main operating companies.

2. ________________ the purchase of the ground, freight, and other ________ services, Federal Express had reorganized all of its major ________________ in information technology, aircraft, facilities/business services, vehicles/fuel/ground service equipment, and supply chain logistics groups under the Strategic Sourcing and Supply group, led by Edith Kelly Green.

3. After the purchase of these different businesses, the supply management function was reorganized into a ________ supply chain management (SCM) sourcing model.

Ⅱ. Translation.

1. 在采购了这些不同的业务之后，供应管理的功能被重新整合成一个中央控制的供应链管理采购模式。

2. 最近两年以来，联邦快递供应链管理一直致力于平衡所有联邦快递子公司的采购和签约。

3. 假设将要有一场谈判，团队将对区域供应商及供应商资质进行深度调研。

4. 当使用方提出要求，公司资源专家或团队必须判定是否值得使用策略。

5. 投资回报可能无须启用完整供应商评估程序。

6. 从整个采购发生来看，这是一个走向集中管理的渐变过程。

Ⅲ. Reading and answering questions.

Third part logistics providers are to lower the total cost of logistics for the supplier and improve the service level to the customer. Third part logistics have been growing rapidly. Cost reduction and demands for better and cheaper services are the main drives behind the growth. A third part logistics provider will be in a position to consolidate business from several companies and offer frequent pick-ups and deliveries, whereas in-house transportation cannot. Other reasons are as follows:

(1) The company does not specialize in logistics.

(2) The company does not have sufficient resources.

(3) Eager to implement better logistics operation or does not have time to develop the required capabilities in-house.

(4) The company is venturing into a new business with totally different logistics requirements.

(5) Merger or acquisition may make outsourcing logistics operations more attractive than to integrate logistics operations.

Questions:

1. Third Part logistics provides (　　) logistics services.

A. single　　B. some

C. simple　　D. All of the above

2. Third part logistics is the (　　) between the supplier and customer.

A. link　　B. bridge

C. middle　　D. transport

3. The advantage of third part logistics are (　　).

A. better service　　B. lower cost

C. overall　　D. A and B

4. Third part logistics is more (　　) than other logistics provides in operations.

A. quick　　B. fast

C. specialized　　D. exact

5. What promotes the third part logistics developing its business? (　　)

A. Outsourcing　　B. Transporting

C. Warehousing　　D. Distribution



Reading Material A

Integration Meets Resistance

While the idea of functional integration is logical and **appeals to common sense**, it is not always supported by other unit managers. It is natural that any attempt to reposition management authority and responsibility will meet **resistance**. Many logistics executives can provide examples of how attempts to reorganize were met with **rivalry** and **mistrust**—not to mention **accusations** of empire building. Traditionally, in organizational structures, financial **budgets** follow operational responsibility. **Likewise**, power, visibility, and compensation result from managing large **head counts** and substantial budgets. Logistical reorganizations, therefore, was typically seen as a way for logistical managers to gain power, visibility, and compensation at the expense of other managers. This also was an **ample** reason for other managers to protect their power by resisting logistics functional integration. As a result, unified logistical organizations faced considerable resistance. But in an increasing number of firms, benefits were sufficient to **empower** reorganization.

【Key Words】

Word	Part of speech	Meaning
appeal to	*v.*	呼吁；上诉；要求；对……有吸引力
common sense		常识
resistance[ri'zist(ə)ns]	*n.*	阻力；电阻；抵抗；反抗；抵抗力
rivalry ['raiv(ə)lri]	*n.*	对抗；竞赛
mistrust[mis'trʌst]	*n.*	信任；怀疑
	vt. & vi.	不信任；怀疑
accusation[ækju'zeiʃ(ə)n]	*n.*	控告，指控；谴责
budget ['bʌdʒit]	*n.*	预算，预算费
	adj.	廉价的
likewise['laikwaiz]	*adv.*	同样地；也
head count		人口调查
ample['æmp(ə)l]	*adj.*	丰富的；足够的；宽敞的
empower[im'pauə, em-]	*vt.*	授权，允许；使能够

【Questions】

1. Why is functional integration not supported by other unit managers?
2. Give some examples of resistance to a firm's logistics functional integration.



Reading Material B

Integrated Logistic Center Reports

XI'AN, December 10, China's largest modern trade and logistics center, which was invested

by China South City (Shenzhen) Co., Ltd. Limited and Xin Hao Da (Hong Kong) Holding Co., **broke earth** at the Xi'an International Trade & Logistics Park.

The first phase of the park has a land area of about 3 square kilometers and a building area of around 4 million square meters, with an investment of more than CNY 6 billion. And it can be filled with 25,000 to 30,000 companies, creating an operating **revenue** of CNY 50 billion.

The park will be composed of a transaction and show zone, a production service zone, and a living service zone. Moreover, it has three phases in all, and will be mainly **engaged in** exhibition, transaction, information, market expansion, technology innovation, and industrial tour after the completion.

This project will be the largest distribution center and the International Integrated Logistics Center And this project also shows the stable step of export-oriented economy of Xi'an International Trade and Logistics Park.

—*China Daily* 2009-12-12

China South City Xi'an, located in the northeast area of Xi'an city, has a planned total site area of approximately 10 square kilometers. The group plans to undertake the construction in three phases. The construction of an integrated logistics and trade center will take up five square kilometers while the other five will be used for the construction of complexes for residential and commercial uses as well as **ancillary facilities**.

On 3 November 2009, China South City (Shenzhen) Co., Ltd., a wholly owned subsidiary of China South International, the Xi'an International Trade and Logistics Park Management Committee, Xin Hao Da (Hong Kong) Holding Co. and the Xi'an Government entered into a project agreement for the Xi'an project. **Pursuant to** the Project Agreement, China South International and Xin Hao Da will form a **Joint Venture** Company, in which they will own 65% and 35%, respectively. The development of the Xi'an project provides an excellent opportunity for the group to extend its **geographical** reach to strategic locations in the northwest of the **PRC**.

—PR Newswire Asia 2009-12-15

【Key Words】

broke earth		破土动工
revenue [ˈrevənjuː]	*n.*	税收，国家的收入；收益
engaged in		从事于；忙于
ancillary facilities		附属设施 辅助设备
pursuant to		依照，按照，依据
joint venture		合资企业；联合经营
geographical[dʒiəˈgræfik(ə)l]	*adj.*	地理的；地理学的
PRC		the People's Republic of China 的缩写，中华人民共和国

【Questions】

1. What are the strategies of the largest logistics center SinoCast?
2. What are the advantages of the modern trade and logistics center?

参 考 译 文

第 9 章　一体化物流

案例分析

供应链的整合将成为现实

能够更好地将不同公司联合及协调起来的，以客户为中心的供应链越有可能获得比较竞争优势。这点已经被沃尔玛、戴尔和 IBM 的案例证明了。建立在共同目标、商业策略和信息透明度基础上的供应链整合将对公司的产能投资、存货、设计和反应产生重大的影响，并且成为公司全球产品服务、运营制造、资源范围的基础。

这里将要详细讨论的例子是摩托罗拉公司的供应链整合。在 2005 年，摩托罗拉下达了整合全球范围内供应链不同要素的任务，其目标锁定在成本、现金、客户服务方面。成本竞争可以保证竞争性的价格，现金可以保证公司投资，客户服务可以保证顾客回头率。

由于摩托罗拉在全球范围运营，因此该任务颇具挑战性。销售覆盖全球各个地区而采购则来自 47 个供应商（2004 年），并且一直以来这 6 个业务部门在资源和设施方面基本上没有任何交流。

为了达到一个整合供应链的改革，目标聚焦在整合和连接产品设计、采购、制造、物流和客户服务。除此以外，以下关键六步在执行变革时提供了高水准的流程。

（1）识别顶级流程并在全公司复制。

（2）建立大小合适的，并且能够改进与关键供应商的关系的供应基地。

（3）建立清晰完整的供应商质量要求并且通过表现计分卡提供反馈。

（4）建立有高效有效的制造和物流运营系统。

（5）致力于信息技术改进将业务单元影响最大化。

（6）建立行动优先和结果导向的企业文化。

2007 年变革的结果是引人注目的，比如说：

（1）不同团队能够识别最好和最优的行为并在全球执行推广。

（2）业务部门协调统一进行报价和奖励业务。

（3）供应商被要求提供“质量改进方案”才能继续和摩托罗拉合作，摩托罗拉给供应商提供表现数据。

（4）在检查了全球范围和整合了设施之后，摩托罗拉的生产和配送运营面积降低了 40%。

（5）摩托罗拉 90%的信息技术系统花费用在支持公司全体，而不是仅仅支持一个部门。

（6）另外，2006 年年底取得了一系列成就，包括供应商次品百万分率降低了 50%；客户准时送货率达到 85%～92%（从开始的 30%～40%起有所提高）；材料利用率、产品质量、制造效率提高了 40；存货周转率提高了 18%。

Text A

一体化物流

一体化的定义是预测顾客的需求过程及为满足这些需要和渴望，而获取资金、物资、人

员、技术和必要的信息，优化产品或服务、建立网络以满足客户的要求，以及使用网络及时地满足客户的要求。

一体化已成为物流管理发展的重要主题。而40年前，物流管理才刚刚处于区域性发展阶段，如今许多贸易活动影响着全球一体化的供应网络，包括供应商体系、销售商体系、使用的不同运输方式及承运人。

基本上，一体化或者整合国际物流管理的概念是指作为一个整体系统来管理多样的物流行为。对于那些没有采取系统化管理的企业来说，物流只是分散于不同组织功能块的零碎的、不协调的一系列行为，并且各个功能块各自为政，有自己的预算、优先级别和衡量系统。

一些公司，像米勒、3M及惠而浦等发现通过客户服务、运输管理、仓储、存货管理、订单流程管理、信息系统管理、生产计划和采购管理来将物流行为整合起来能够带来总成本的下降。

这种国际物流行为的执行过程可能是迂回复杂的。举例来说，一家公司可能在中国购买生丝原料，在韩国纺织，在意大利印花，并将它在美国市场上出售。

由买方付钱给卖方的这种支付行为也成了一场伴随货物流转的单据流转。国际物流意味着单证流转也和货物流转一样是物流过程的一大部分。交易双方处理合同和贸易合约，与此同时物流部门处理货物的流转。渠道之间互相独立，即一家公司的销售处、办公地点和其配送中心并不在同一个地方。然而，它们在销售、支付和发货过程中又极其配合。

国际物流中的整合能够提高存货的国际流转、国际运输和仓储资产利用程度，并常能消除重复劳动。举例来说，相比较采购部和内部物流承运人谈判及物流部和外部物流承运人谈判，不如由一个部门同时就内部和外部物流活动进行统一谈判。由中心指导的各个不同物流行为的整合能够迫使成本可以在以下的物流活动，如客户服务、运输、仓储、库存管理、订单处理、生产计划和采购当中达到平衡。

Text B

联邦快递公司的整合模式

联邦快递公司价值200亿美元，是运输、信息、物流解决方案等方面的市场领军者，为六大运营公司提供策略指导。它们分别是联邦快递、联邦快递陆运、联邦快递海运、联邦快递关键客户、联邦快递贸易网络和联邦快递服务。

在收购陆运、海运和其他非快递基础服务之前，联邦快递已经在战略采购与供应团队Edith Kelly Green的领导下重新组织规划主要的间接费用，其中包括信息技术、航空、设施、业务服务、机车、汽油、地面服务设备及供应链物流团队的费用等。

在采购了这些不同的业务之后，供应管理的功能被重新整合成一个中央控制的供应链管理（SCM）采购模型（“中央”是指集中所长的中央致力于采购策略团队的中心化）。

最近两年以来，联邦快递供应链管理一直在致力于平衡所有联邦子公司的采购和签约。关于办公设备，代替每个公司一份合同的是，供应链管理提供满足不同交易形式双方谈判的公司简明合同。

从整个采购发生来看，这是一个走向集中管理的渐变过程。它是大额费用领域和不同政策要求的中心。联邦快递公司建立了以下七步流程：

第一步，使用者就某个项目提出要求。当使用方提出要求，公司资源专家或团队必须判定是否值得使用策略。这种典型做法是使用投资回报率作为参考指标：是否费用规模够大，

值得花费大量时间启用成熟的供应商评估系统。例如，如果某项需求只需每年花费 20 万美元，投资回报可能无须启用完整供应商评估程序。然而，如果投资足够大，团队将结合行业和商品就此类别进行评估。这种评估将考察采购行为的本质：值多少钱？和谁一起？与现存供应商会有哪些问题？如果价值不够大，使用者可能直接通过 Ariba 系统（一种物流采购系统）直接下采购单和开发票。

第二步，假设 9 月 1 日将有一个大型项目，团队将进入战略采购流程，本质上是利用所有的信息并决定如何进入市场。项目要求是否合适？是否要求保留现存供应商关系？还是要重新谈判并针对采购策略重新决策？

第三步，假设将要有一场谈判，团队将对区域供应商及供应商资质进行深度调研。供应商是否能在用户标准、服务等方面达到要求？最终目标是形成可以发送意见书的供应商清单。团队将做出一份意见书供应商组合分析。

第四步，得到通行证的另一步骤是再次回顾策略并让团队再次审核。是否发现一些事情可能会改变谈判？团队形成策略，是否会要求使用反向拍卖或常规意见书作为供应商评估？是否还有一些要求要做？如果这样，将意见书流程推进到选择过的供应商。

第五步，收到意见书后，团队执行供应商筛选和谈判流程。

第六步，一旦团队完成选择，需要完成集成。这个是通过将 Ariba 工具箱应用于供应商，并且识别在合同执行中产生的集成冲突。

第七步，流程的最后一步是通过联邦快递公司供应商平衡计分卡系统检测供应方市场。

阅读材料 A

物流整合碰到了阻力

即使这种功能整合的想法是合情合理的，哪怕从常识来看也是如此，它也不会总是得到其他部门经理的支持。任何涉及权力和责任重新分配的尝试总会碰到阻力，这已经是人之常情。很多物流经理会举出例子证明他们遇到了怎样的对抗和不信任——更不用提大企业组织重建当中遭到的指责了。在传统上，在组织结构中，财务预算对应着相应经营管理中承担的责任。同样，权力、升迁及补偿在管理中是按人数量化的并且实实在在地预算过。因此，物流重组也会被看作物流经理借此对付其他经理捞取权力、升迁和补偿的机会。这也成了其他部门经理为保护自身权力而抵制物流重组的最大理由了。最终结果是，统一规划的物流组织面临相当多的阻力。但是，重组带来的利益本身已有足够力量支持重组，因此，这部分（支持重组的）公司数量呈增长之势。

阅读材料 B

关于一体化物流中心的报道

西安，12 月 10 日，我国最大的现代商贸物流中心在西安国际贸易物流园开工建设，该项目由华南城（深圳）控股与 Xin Hao Da（中国香港）控股有限公司联合开发。

该园区项目第一阶段有一个面积约 3 平方千米的地块，约 400 万平方米的建筑面积，超过 60 亿元人民币的投资。它可以容纳 25 000～30 000 家公司，有望创造 500 亿元人民币的经营收入。

该园区将由一个交易展示区、一个生产服务区和一个生活服务区组成。此外，它还分为3个阶段（开发），建成后主要用于会展、办公、信息、市场拓展、技术创新、工业旅游。

该项目将成为（西安）最大的配送中心和国际综合物流中心。该项目还标志着西安国际贸易物流园区外向型经济服务区迈出了坚实的一步。

——《中国日报》2009-12-12

华南城西安项目在西安东北有一处规划总用地面积约10平方千米的地块。集团计划分3个阶段进行建筑施工。其中一个综合物流中心的建设将占地5平方千米，而其他5平方千米地块将用于住宅、商业及配套设施建设。

在2009年11月3日，华南城（深圳）控股——中国南方国际集团的全资子公司、西安国际商贸物流园区管理委员会、Xin Hao Da（中国香港）控股与西安市政府签订了项目协议。根据项目协议，中国南方国际和Xin Hao Da将组建一家合资公司，它们将分别持有35%和65%的股份。此次在西安的开发项目，为该集团扩大其在中国西北部区域的战略优势提供了一个极好的机会。

——美通社（亚洲）2009-12-15



Chapter 10

Logistics Documents



Case Study

FedEx Trade Networks for Cargo Insurance

For more than a century, companies across North America have trusted FedEx Trade Networks for reliable customs **brokerage**, international freight forwarding and transportation.

Are your shipments fully protected in case of **disaster**? Do you really have enough coverage to protect the cargo that you are moving halfway around the world? Do you know when you are covered and when you are not covered? Don't find out the hard way that you don't have enough insurance. FedEx Trade Networks Transport & Brokerage, Inc. can **assist** you with cargo insurance that offers the best protection available at rates you can afford.

Many shippers misunderstand cargo insurance in particular and the insurance industry in general. Brokers assume that because they purchased a "**contingency** cargo liability" policy, they will be **compensated** for all loss-and-damage claims. In fact, "**Exclusions**", which can be found in the "endorsements" section of insurance policies, modify those policies to exclude the most frequent causes of transit claims. They also may exclude whatever recent **catastrophe** has led to a large number of claims payments.

Some policies cover only the period that the goods are in the **custody** of a "common carrier". Therefore, shippers must be certain that every form of transportation they use is covered, including contract carriage and private carriage, and that the policy covers the entire period from the time a shipment leaves the shipping dock until it is delivered to a customer.



Making sure that carriers have the right insurance policies presents a challenge because their policies are not very **accessible** to shippers. Carriers generally offer "Certificates of Insurance" to shippers as proof of coverage. However, these certificates contain a disclaimer of liability that applies if the issuer fails to notify the certificate holder of the **cancellation** or **modification** of the insurance coverage. More importantly, these certificates do not reveal the exclusions in the underlying policy. In addition to these common exclusions, motor carrier cargo policies contain a standard exclusion for "employee **infidelity**". For that reason, shippers should insist that all parties with whom they do business obtain a separate **fidelity** bond. Under the I.C.C.[15] Termination Act , shippers are responsible for obtaining a copy of carriers' tariffs to determine the extent of their liability.

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⑮ I.C.C.　伦敦保险协会货物保险条款（Institute Cargo Clause）的简称。目前世界上大多数国家在海上保险业务中直接采用I.C.C.所制定的协会货物条款。

【Key Words】

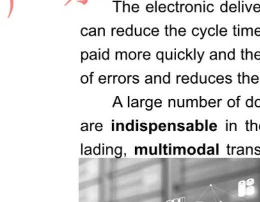
brokerage [ˈbrəukəridʒ]	*n.*	经纪人（或中间人）业务，经纪行
disaster [diˈzɑːstə(r)]	*n.*	灾难
assist [əˈsist]	*vi.*	帮助；出席
contingency [kənˈtindʒənsi]	*n.*	偶发事件；偶然；依附条件，制约条件
compensated [ˈkɔmpenseit]	*v.*	补偿；赔偿；付报酬
exclusion [ɛkˈskluʃən]	*n.*	排除；除外；逐出
catastrophe [kəˈtæstrəfi]	*n.*	大灾难；大祸；彻底失败
custody [ˈkʌstədi]	*n.*	拘留；监禁；监护；羁押
accessible [əkˈsesəbl]	*adj.*	可得到的；易接近的；可进入的；易理解的
cancellation [kænsəˈleiʃn]	*n.*	取消；撤销；废除
modification [mɔdifiˈkeiʃn]	*n.*	修改；修正；修饰
infidelity [infiˈdeləti]	*n.*	不信神；不忠
fidelity [fiˈdeləti]	*n.*	忠实；忠诚；准确性；保真度



Text A Electronic Delivery of Documents

In the modern world, the document software can be used to create, view, e-mail, and print the **formatted** document. Lots of logistics documents can be printed. For example, an easy-to-use online bill of lading **generator** will save time and provide the documents **instantly**.[1]

The electronic delivery of the bill of lading can speed up the trade finance process. It can reduce the cycle time for forwarding and presentation of documents. The exporter gets paid more quickly and the importer gets title to the goods sooner. It also **eliminates** the risk of errors and reduces the costs related to manual document preparation.



A large number of documents are needed in the global transport. Logistics documents are **indispensable** in the logistics services, which mainly include letter of credit, bill of lading, **multimodal** transport documents, invoice, insurance policy, inspection certificate, certificate of origin, packing list, air waybill, shipper's export declaration, etc..



Documentation is an important area of logistics management. The major **characteristics** about documents are accurate, **integrated**, concise and timely. Accuracy means that the details of logistics documents must be fully **consistent** with that of sales contract, **ambiguous** words and expressions can't be

used;[2] **integrity** is that all logistics documents should include all details; concision means that logistics documents should avoid using **redundant** words and expressions. In order to avoid unnecessary **delays** or misunderstandings, logistics documents should be prepared in time.[3]

Trade between two companies located in different countries begins with the business contract. Physical moment of the goods must be linked with the movement of various related documents. In actual practice, the logistics documents are very important in the international trade.

【Key Words】

formatted [ˈfɔːmætid]	*adj.*	有格式的
generator [ˈdʒenəreitə]	*n.*	发电机，发生器
instantly [ˈinstəntli]	*adv.*	立即地，即刻地
eliminate [iˈlimineit]	*v.*	除去，排除，剔除
indispensable [.indisˈpensəbl]	*adj.*	不可缺少的
multimodal [ˈmʌltiməudl]	*adj.*	多方式的，多模式的
characteristic [.kæriktəˈristik]	*n.*	特性，特征，特色
integrated [ˈintigreitid]	*adj.*	整合的，完整的
consistent [kənˈsistənt]	*adj.*	始终如一的，一致的，坚持的
ambiguous [æmˈbigjuəs]	*adj.*	模棱两可的
integrity [inˈtegriti]	*n.*	诚实，正直，完整，完善
redundant [riˈdʌndənt]	*adj.*	多余的；冗长的
delay [diˈlei]	*n.*	耽搁，迟滞

【Notes to the Text A】



【对应翻译】

[1] For example, an easy-to-use online bill of lading generator will save time and provide the documents instantly.

“easy-to-use”是复合词，意为“方便使用的，易用的”。

“bill of lading”是“提货单”。

[2] Accuracy means that the details of logistics documents must be fully consistent with that of sales contract, ambiguous words and expressions can't be used.

“be consistent with”意为“与某事物并存（一致）”。

[3] In order to avoid unnecessary delays or misunderstandings, logistics documents should be prepared in time.

“in order to”意为“为了……”，作为目的状语。

【参考答案】

【Exercises to Text A】

Ⅰ. Fill in the blanks.

1. In the modern world, ________ can be used to create, view, e-mail, and print the formatted document.

2. The electronic delivery of the bill of lading can ________ the trade finance process.

3. ________ are indispensable in the logistics services, which mainly include letter of credit, bill of lading, multimodal transport documents, invoice, etc. .

4. The major characteristics about documents are ________.

5. ________means that the details of logistics documents must be fully consistent with that of sales contract, ambiguous words and expressions can't be used.

Ⅱ. Choose the best answer.

1. The electronic delivery of the bill of lading can (　　) the trade finance process.

A. slow down　　B. retard　　C. obstruct　　D. speed up

2. ________ gets paid more quickly and ________ gets title to the goods sooner. (　　)

A. The exporter; the importer　　B. The importer; the exporter

C. The importer; the buyer　　D. The exporter; the seller

3. The major characteristics about documents are (　　), integrated, concise and timely.

A. large　　B. small　　C. accurate　　D. short

Ⅲ. True or false.

1. The electronic delivery of the bill of lading can reduce the cycle time for forwarding and presentation of documents. (　　)

2. Logistics documents are dispensable in the logistics services. (　　)

3. In order to avoid unnecessary delays or misunderstandings, logistics documents should be prepared in time. (　　)

Ⅳ. Translation.

1. 出口方可以更快地得到付款，进口方可以更快地取得货物的所有权。

2. 在物流服务中，物流单据是必不可少的。

3. 为了避免不必要的延迟或误解，物流单据应该及时准备好。



Text B Letter of Credit

1. Concept of L/C

A letter of credit is a written promise which is issued to the exporter by the opening or **issuing bank** upon the request of the importer, promising a certain payment to a **beneficiary** against complying documents as stated in the letter of credit.[1] Letter of credit is **abbreviated** as LC or L/C, and often is referred to as a documentary credit, abbreviated as DC or D/C.

When read a letter of credit, we can find the main content of L/C includes the follow information: destination bank, type of documentary credit, date and place of issue, date and place of expiry, applicant, beneficiary, advising bank, documents required, description of goods or services, and so on.

2. Type of L/C

Letter of credit may be either revocable or irrevocable. Either a L/C is **revocable** or is irrevocable, it is referenced on its face.

A revocable letter of credit may be **revoked** or modified for any reason, at any time by the issuing bank without notification.[2] If a **correspondent** bank is engaged in a transaction that involves a revocable letter of credit, it serves as the advising bank. It is not a commonly used instrument, and is generally used to provide guidelines for shipment.

The irrevocable letter of credit may not be revoked or amended without the agreement of the issuing bank, the advising bank, and the beneficiary. An irrevocable letter of credit insures the beneficiary that if the required documents are presented and the terms and conditions are complied with, payment will be made.[3]

3. The operation of documentary credit.

First, the issuance of a L/C starts with the buyer who instructs his bank to open a L/C in favor of the seller for the amount of the purchase. Then, the buyer's bank (issuing bank) sends the L/C to its correspondent in the seller's country, the negotiating bank or the advising bank, giving instructions about the amount of the credit, the beneficiary, the currency, the documents required and other special instructions. Upon receipt of the L/C, the correspondent advises the seller of the same immediately. The seller deals with the correspondent bank and prepares for the shipment of the buyer's order. After shipment, the seller presents the relative shipment documents to the correspondent bank. Then, the correspondent bank pays the money to the seller when documents presented are found to be in order, and then sends all the shipping documents to the buyer's bank, which, in turn,

passes them to the buyer, who finally **reimburses** the correspondent bank through the buyer's bank.

4. Advantages of using L/C under documentary credit

As the documentary credit is operated though banks, so it has advantages to both the applicant and beneficiary. For the applicant, it is a conditional **undertaking** where payment can be made on his behalf only against the documents which will transfer to him the title to the goods. For the beneficiary, it is a bank undertaking to which he can look for payment. Besides, the L/C improves credit and negotiating status of the importer, so the importer may be able to negotiate for a lower purchase price and better terms.

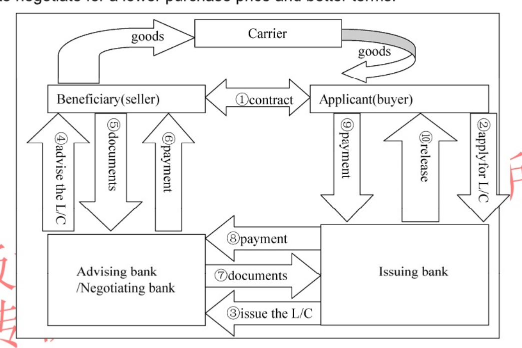


Figure 10.1 Using L/C under documentary credit

5. **Negotiability** characteristic of L/C

Letter of credit are usually **negotiable**. The issuing bank is obligated to pay not only the beneficiary, but also any bank **nominated** by the beneficiary. Negotiable instruments are passed freely from one party to another almost in the same way as money. To be negotiable, the letter of credit must include an unconditional promise to pay, on demand or at a **definite** time.

The nominated bank becomes a holder **in due course**. As a holder in due course, the holder takes the letter of credit for **authority**, in **good faith**, without notice of any claims against it. The transaction is considered a straight negotiation if the issuing bank's payment obligation extends also to the beneficiary of the credit. If a L/C is a straight negotiation it is referenced on its face by "we **engage with** you" or "available with ourselves".

6. Discrepancies

A most important point for the exporter to remember is that the documents, which are an integral part of the documentary credit, must be absolutely in accord with those stipulated in the letter of credit. If there is any **discrepancy**, the undertaking of payment

given by the bank no longer exists. Examples of common discrepancies are:

(1) The term of the letter of credit has expired.

(2) Shipment of goods is late.

(3) Inadequate in cover.

(4) Absence of a document.

Exporters should be most **vigilant** to ensure that they comply exactly with the stipulated documents required. If there are some requirements in the documentary credit that the exporter can not meet, he should seek to have it amended by the importer. Otherwise payment may not be received despite goods having been shipped. In practice, discrepancies can usually be overcome with the agreement of the importer but if, for example, the importer was seeking an excuse not to pay a discrepancy presents him with a ready opportunity to avoid payment.

【Key Words】

issuing bank		开证行
beneficiary [.beniˈfiʃəri]	*n.*	受益人
abbreviate [əˈbri:vieit]	*v.*	缩写，使……简略
revocable [ˈrevəkəbl]	*adj.*	可废除的，可撤销的
revoke [riˈvəuk]	*vt.*	撤回（回想）
	n.	取消（回想）
correspondent [.kərisˈpɔndənt]	*n.*	通讯记者，通信者
reimburse [.ri:imˈbə:s]	*vt.*	偿还，报销
undertake [.ʌndəˈteik]	*v.*	从事，保证
negotiability [niˈgəuʃjəblity]	*n.*	可磋商性，可转让性，流通性
negotiable [niˈgəuʃjəbl]	*adj.*	可磋商的，可转让的，可通行的
nominate [ˈnɔmineit]	*v.*	提名的，指定的
definite [ˈdefinit]	*adj.*	明确的，一定的
in due course		顺次
authority [ɔ:ˈθɔriti]	*n.*	权力，权威
good faith		真诚，善意
engage with		与……接洽；与……衔接
discrepancy [disˈkrepənsi]	*n.*	相差，差异，差别，不符之处
vigilant [ˈvidʒilənt]	*adj.*	警醒的，警戒的，警惕的

【Notes to the Text B】


【对应翻译】

[1] A letter of credit is a written promise which is issued to the exporter by the opening or issuing bank upon the request of (the applicant) the importer, promising a

certain payment to a beneficiary (the exporter) against the appropriate documents as stated in the letter of credit.

"which"从句用来解释说明"letter of credit"是怎么样的一种书面保证，"promising"引领的短语进行补充说明。

[2] A revocable letter of credit may be revoked or modified for any reason, at any time by the issuing bank without notification.

"without"在此处作介词，意思是"无，没有"。例如：

Without the sun, nothing would grow. 没有太阳，就不会有生物。

The rumor was without foundation. 那条谣言毫无根据。

[3] An irrevocable letter of credit insures the beneficiary that if the required documents are presented and the terms and conditions are complied with, payment will be made.

present 提交，呈现

complied with 照……行事，答应。例如：

Everyone should comply with the law. 每个人都应该遵守法律。

【参考答案】

【Exercises to Text B】

Ⅰ. Fill in the blanks.

1. A letter of credit is a written promise which is issued to the exporter by ________.

2. As the documentary credit is operated though banks, so it has advantages to ________.

3. ________ is obligated to pay not only the beneficiary, but also any bank nominated by the beneficiary.

4. To be negotiable, the letter of credit must include ________ to pay, on demand or at a definite time.

5. The nominated bank becomes ________ in due course.

Ⅱ. Choose the best answer.

1. A letter of credit is a written promise which is issued to ________ by the opening or issuing bank upon the request of ________. (　　)

A. the exporter; the importer　　B. the importer; the exporter

C. the importer; the buyer　　D. the exporter; the seller

2. For the applicant, it is a conditional undertaking where payment can be made on his behalf only against the (　　).

A. documents　　B. goods

C. title　　D. payment

3. The L/C improves credit and negotiating status of the importer, so the importer may be able to negotiate for a (　　) purchase price and better terms.

A. higher　　B. steady

C. lower　　　　D. unquiet

4. The transaction is considered a straight negotiation if the (　　) payment obligation extends also to the beneficiary of the credit.

A. seller's　　　　B. exporter's

C. issuing bank's　　　　D. buyer's

Ⅱ. True or false.

1. Letter of credit is abbreviated as LC or L/C, and often is referred to as a documentary credit, abbreviated as DC or D/C. (　　)

2. Either an L/C is revocable or is irrevocable, it is referenced on its back. (　　)

3. Besides, the L/C improves credit and negotiating status of the importer. (　　)

4. To be negotiable, the letter of credit must include the conditional promise to pay, on demand or at a definite time. (　　)

Ⅲ. Translation.

1. 信用证是基于申请者（进口方）的请求，由开证银行开给出口方的一份书面保证，如果有信用证所列的适当单据，就保证给受益人（出口方）一定数额的支付款。

2. 可撤销的信用证可以由开证行在没有通知的情况下，在任意时间因任意原因撤销或修改。

3. 如果出示了所要求的单据，并且与贸易术语和各项条件一致，不可撤销信用证能够确保受益人得到付款。

4. 信用证能够提高进口方信贷和议付的条件，从而也许能够以更低的购买价格和更优惠的条件来议付。



Text C　Bill of Lading

1. Concept of bill of lading (B/L)

A bill of lading is a document issued and signed by a **shipping company** or its agents **acknowledging** that the goods mentioned in the bill of lading have been duly received for shipment, or shipped on board of a vessel, and undertaking to deliver the goods in the like

order and condition as received, to the consignee.

2. Functions of B/L

Marine bill of lading perform a number of functions. Generally, it is **receipt for the goods** shipped, a **document of title** to the goods and evidence of the terms of the contract of a consignment.

A bill of lading is a receipt issued by a carrier that an identifiable consignment of goods has been received by him for shipment, or actually loaded on board his ship. The bill of lading as a receipt will show the quantity and condition of the cargo loaded, ship's name, the destination, details of date and so on.

A bill of lading is a document of title to the goods. The **possession** of a bill of lading is **equivalent** in law to possession of the goods. The holder of the bill of lading is able to obtain delivery of the goods at the port of destination and during transit the goods can be sold merely by endorsing the bill of lading.

Additionally, the terms of bill of lading provide evidence of the contract of carriage between the carrier and the shipper. The terms of the bill of lading contain the terms of the contract.

3. Types of bill of lading

There are several types of bill of lading, and some of them can be discussed as following:

(1) **Order B/L** versus **Straight B/L**. Order B/L means that the carrier will deliver the goods at the port of destination not solely to the named consignee, but to any person **designated** by him. An order B/L is a negotiable document. However, straight B/L is not negotiable, and can't be transferred to the third parties, so delivery of goods can only be taken by the named consignee.[1]

(2) **On board shipped B/L** versus **Received for shipment B/L**. The former confirms that the goods have been loaded and are actually on board of the ship. However, the later is issued by the shipping company when goods have been given into the **custody** of the shipping company, but have not yet been placed on board of the vessel.

(3) **Clean B/L** versus **Unclean B/L**. The clean B/L indicates that the goods were received without damages, **irregularities** or short shipment, there was no **defect** in the apparent order and condition of the goods at the time of receipt or shipment. In contrast, the unclean B/L, which is also called dirty B/L or claused B/L, is the opposite of the clean B/L, usually the words "**insufficient packing**", "missing safety seal" or the like are indicated on the B/L.[2]

(4) **Direct B/L** versus **Through B/L**. The direct B/L means that the cargo is always on the same ship from port of lading to port of destination. In other words, transshipment hasn't happened. However, the through B/L covers goods being transshipped during the transportation, but the first carrier has the responsibility as the principal carrier for all stages of the journey.

<table>
<tr><td colspan="4">1) SHIPPER</td><td colspan="3">10) B/L NO.</td></tr>
<tr><td colspan="4">2) CONSIGNEE</td><td colspan="3" rowspan="5">COSCO
中国远洋运输（集团）总公司

CHINA OCEANSHIPPING (GROUP) CO.

ORIGINAL

COMBINED TRANPORT BILL OF LADING</td></tr>
<tr><td colspan="4">3) NOTIFY PARTY</td></tr>
<tr><td colspan="2">4) PLACE OF RECEIPT</td><td colspan="2">5) OCEAN VESSEL</td></tr>
<tr><td colspan="2">6) VOYAGE NO.</td><td colspan="2">7) PORT OF LOADING</td></tr>
<tr><td colspan="2">8) PORT OF DISCHARGE</td><td colspan="2">9) PLACE OF DELIVERY</td></tr>
<tr><td colspan="7">11) MARKS 12) NOS & KINDS OF PKGS 13) DESCRIPTION OF GOODS 14) G. W. (kg) 15) MEAS(m^3)</td></tr>
<tr><td colspan="7"></td></tr>
<tr><td colspan="7">16) TOTAL NUMBER OF CONTAINERS OR PACKAGES(IN WORDS)</td></tr>
<tr><td>FREIGHT & CHARGES</td><td colspan="2">REVENUE TONS</td><td>RATE</td><td>PER</td><td>PREPAID</td><td>COLLECT</td></tr>
<tr><td>PREPAID AT</td><td colspan="3">PAYABLEAT</td><td colspan="3">17) PLACE AND DATE OF ISSUE</td></tr>
<tr><td>TOTAL PREPAID</td><td colspan="3">18) NUMBER OF ORIGINAL B(S)L</td><td colspan="3"></td></tr>
<tr><td colspan="4">LOADING ON BOARD THE VESSEL
19) DATE</td><td colspan="3">20) BY</td></tr>
</table>

Figure 10.2 Sample of bill of lading

Besides the above several kinds of bill of ladings, types of marine B/L are also include the long form B/L and the short form B/L, etc. .

4. Issuing bill of lading

The bill of lading should be signed by either shipping company or by an authorized agent, and it must show how many signed originals were issued. The originals, which are marked as “originals” on their face, are proof of ownership of goods.[3] Bill of lading is made out in sets and any number of copies may constitute the set according to the requirements of the particular transaction and the importer. A set contains at least two originals. Usually, a set of three originals is the most common.

5. Date of bill of lading

The date of bill of lading is very important, if the letter of credit stipulates a deadline for shipment. Because the B/L can show whether the goods have been shipped on time. Unless otherwise specified in the credit document or unless the insurance document clearly

specifies that the cover is effective at the latest from the date of shipment, the insurance document must be dated not later than the date of issuing of the bill of lading.

6. Endorsement on bill of lading

In practice, some bill of ladings can be transferable. The consigner or consignee can transfer the B/L by **endorsement**. There are two kinds of endorsement: **special endorsement** and **endorsement in blank**.[4] The holder may **convert** the blank endorsement **into** a special endorsement by inserting the name of a person to whom delivery is to be made.

【Key Words】

shipping company		船运公司
acknowledge [əkˈnɔlidʒ]	*v.*	承认，确认，报偿
receipt for the goods		货物收据
document of title		物权凭证
possession [pəˈzeʃən]	*n.*	财产，所有，拥有
equivalent [iˈkwivələnt]	*adj.*	等价的，相等的
	n.	相等物
order B/L		指示提单
straight B/L		记名提单
designate [ˈdezigneit]	*v.*	指定，标示
on board shipped B/L		已装船提单
received for shipment B/L		收货待运提单
custody [ˈkʌstədi]	*n.*	监护，拘留，监禁
clean B/L		清洁提单
unclean B/L		不清洁提单
irregularity [iˌregjəˈlærəti]	*n.*	不规则
defect [diˈfekt]	*n.*	缺点
insufficient packing		包装不良；包装不固
direct B/L		直达提单
through B/L		联运提单
endorsement [inˈdɔːsmənt]	*n.*	支持，认可，背书
special endorsement		特别背书
endorsement in blank		空白背书
convert…into…		把……转变成……

【Notes to the Text C】


【对应翻译】

[1] However, straight B/L is not negotiable, and can't be transferred to the third parties, so delivery of goods can only be taken by the named consignee.

“take delivery of…” 意为“接收，提取”。此句中，“delivery of goods can only be taken by …” 意为“货物只能由……提取”。

[2] In contrast, the unclean B/L, which is also called dirty B/L or claused B/L, is the opposite of the clean B/L, usually the words “insufficient packing”, “missing safety seal” or the like are indicated on the B/L.

in contrast　与此相反，相比之下。例如：

In contrast with our system, theirs seems very old-fashioned. 他们的制度与我们的相比，显得过于守旧了。

“opposite” 在此处作名词，意为“对立物，对手，对立面”。例如：

Black and white are opposites. 黑和白相反。

[3] The originals, which are marked as “originals” on their face, are proof of ownership of goods.

“original” 在此处作名词，意为“原件，原稿”；“original” 还可作形容词，意为“最初的，原始的，原版的”。例如：

The original picture is in the British Museum. 这幅画的原作在大英博物馆内。

[4] There are two kinds of endorsement: special endorsement and endorsement in blank.

“special endorsement” 意为“特别背书”，又称“记名背书”，即在票据背面记明被背书人的姓名或商号、背书年月日及背书人的签名的背书。被背书人是因背书而取得票据权利的人，其资格法律一般不加限制。

“endorsement in blank” 意为“空白背书”，又称“无记名背书、略式背书、不完全背书”，是指不记载被背书人名称而仅由背书人签章的背书。

【Exercises to Text C】

【参考答案】

Ⅰ. Fill in the blanks.

1. A bill of lading is a receipt issued by a carrier that an identifiable consignment of goods has been ________, or actually loaded on board his ship.

2. Additionally, the terms of bill of lading provide ________between the carrier and the shipper.

3. Order B/L means that the carrier will deliver the goods at the port of destination not solely to the named consignee, but to ________.

4. In contrast, the unclean B/L, which is also called dirty B/L or claused B/L, is the opposite of the ________.

5. The consigner or consignee can transfer the B/L by ________.

Ⅱ. Choose the best answer.

1. Which of the following is not the function of bill of lading? (　　)

A. receipt for the goods shipped

B. a document of title to the goods

C. evidence of the contract of a consignment

D. the contract of a consignment

2. ( ) means that the carrier will deliver the goods at the port of destination not solely to the named consignee, but to any person designated by him.

A. Order B/L　　B. Packing list

C. Shipper order　　D. Manifest

3. The ( ) means that the cargo is always on the same ship from port of lading to port of destination.

A. though B/L　　B. clean B/L

C. direct B/L　　D. order B/L

4. A set contains at least ( ) originals.

A. one　　B. two

C. three　　D. ten

5. A ( ) is issued by the shipper to the carrier requesting allocation of shipping space.

A. B/L　　B. insurance policy

C. shipping note　　D. manifest

Ⅲ. True or false.

1. A bill of lading is a document issued and signed by a shipper. ( )

2. Marine bill of lading is exactly the contract of carriage. ( )

3. An order B/L is a negotiable document. However, straight B/L is not negotiable, and can be transferred to the third parties. ( )

4. The clean B/L indicates that the goods were received without damages, irregularities or short shipment. ( )

5. The consigner or consignee can transfer the B/L by endorsement. ( )

Ⅳ. Translation.

1. 海运提单是由船运公司或其代理人签发，表明单据中所提到的货物已经收到待运或已经装到船只的甲板上，并且把货物以收到的次序和状态交付给收货人。

2. 海运提单的条款提供了对承运人和托运人之间运输合同的证明。

3. 指示提单意味着承运人在目的港不仅可以把货物交付给指定姓名的收货人，还可以交给由其指定的任意人。

4. 与此相反，不清洁提单，也被称为肮脏提单和附有条件的提单，与清洁提单是相对的，通常提单上有“包装不良”“安全的印章或封条丢失”等类似字样。



Reading Material

Logistics Documents in Practices

Invoice is bill for goods and **sets forth** the terms of sale. The invoice is also a basic document. It must fully **identify** the overseas shipment and serve as a basis for the preparation of all other documents which **reproduce** information from it.

Insurance policy provides protection to cargo owners in the event of loss or damage to cargo in transit. There are different types of insurance policies for different **categories** of risks to be covered.

Packing list may be shown on invoice or **separately**, and should contain item by item, the contents of containers with its weight and description.

The **certificate of origin** certifies that place of the origin of the merchandise. Besides the **Federation of Chambers of Commerce**, various other **trade associations** have been authorizes by government to issue certificates of origin.



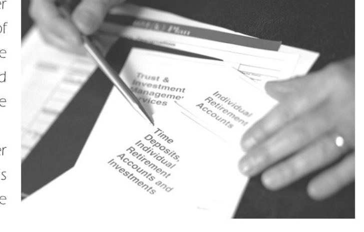
The bill of lading is not a contract of carriage as it is signed only by the carrier. However, it provides evidence of contract of carriage. It serves as a receipt for goods delivered to the carrier, and as a document of title enabling the goods to be transferred from the shipper to the consignee or any other party by endorsement.

A seaway bill is the **replacement** of the traditional ocean bill of lading. The sea way bill is a non-negotiable document and made out to a named consignee who is allowed, upon production of proper identification, to claim the goods without presenting the waybill.

The airway bill is the important document for a **batch** of air freight goods. It constitutes evidence of the **conclusion** of the contract of freight, and the evidence of receipt of goods and conditions of carriage.

A **cargo manifest** provides information regarding cargo on board. A freight manifest gives information regarding freight rates, **surcharges**, **rebates**, etc.. The manifest is prepared by the carrier's agent but the freight forwarder has to handle it while dealing with the customs and port authorities.

A **shipping note** is issued by the shipper to the carrier requesting allocation of shipping space. It is a commitment on the part of the shipper to ship the goods and serves as the basis for the preparation of the bill of lading.



A **delivery order** is issued by the carrier or his agent to enable the consignee or his forwarding agent to take delivery of the cargo from the vessel.

A **mate's receipt**, which is subsequently exchanged for the bill of lading, is the receipt issued by the carrier in the acknowledgement of the goods on board. When the cargo is loaded on the ship, the commanding officer of the ship will issue a receipt called the mate's receipt for goods.

Dock receipt is a receipt may be issued by a port authority to confirm receipt of the goods on the quay or warehouse before shipment. The dock receipt is used to transfer responsibility when an export item is moved by the domestic carrier to the port of embarkation and left with the international carrier for movement to its final destination.

A **weight certificate** confirms that the goods are in line with the weight specified on the bill of lading, invoice, insurance certificate or other specified documents. In so doing, it confirms to the buyer, seller, insurance or other specified parties that the goods were at a specified weight at the time of shipment. The weight certificate is usually requested by the importer to confirm that the weight of the goods in conformity with the exporter sales contract at the time of shipment.

Quality certificate confirms that the quality and specification of a particular consignment of goods is in conformity with the sales contract at the time of shipment. It may be issued by the exporter or a relevant government department as required under letter of credit or sales contract terms. It is essential that cargo description in the quality certificate conform to its terms found in other relevant documents, such as commercial invoice, letter of credit, insurance policy, etc. .

【Key Words】

set forth		陈述（陈列，出发，宣布）
identify [ai'dentifai]	*v.*	识别，认明，鉴定
reproduce [ˌri:prə'dju:s]	*v.*	再生，复制，生殖
insurance policy		保险单
category ['kætigəri]	*n.*	种类，类别
separately ['sepərətli]	*adv.*	分别地
certificate of origin		原产地证书
Federation of Chambers of Commerce		商品贸易委员会
trade association		同业公会；贸易协会

replacement [riˈpleismənt]	*n.*	交换，更换；代替者
batch [bætʃ]	*n.*	一次所制之量，一组；批，成批，分批
conclusion [kənˈkluːʒən]	*n.*	结论
cargo manifest		货物舱单
surcharge [səːˈtʃɑːdʒ]	*n.*	装载过多，额外费
rebate [ˈriːbeitˌriˈbeit]	*n.*	减少
	vt.	减少
shipping note		托运单；船货清单，装货通知单
delivery order		交货单
mate's receipt		大副收据
dock receipt		码头收据
weight certificate		重量证书
quality certificate		质量证书

【Questions】

1. How many documents can you enumerate after reading this article?
2. Please discuss the three documents—bill of lading, sea way bill and air way bill.
3. What is shipping note?
4. What function does the delivery order have?

参 考 译 文

第10章 物 流 单 据

案例分析

联邦快递贸易网络公司办理货物保险

一个多世纪以来，北美各地的公司都很信赖联邦快递（FedEx）贸易网络公司，这是由于该公司的报关代理业务、国际货代和运输业务十分可靠。

你的运输货物是否完全受到保护，可以免受灾难的侵扰呢？你是否真的投保了足够的保险来保护你的那些正在世界各地的路途当中运输的货物呢？你知不知道什么时候在被保险范围之内，而什么时候是处于被保险范围之外呢？不要到最后才发现你确实没有投保足够的保险这样令人痛苦的事实。联邦快递贸易网络公司的运输和代理公司可以帮你办理货物保险，提供在你负担范围内的最好保障。

许多托运人都不能正确理解专门的货运保险和一般的保险行业。有经纪人认为如果他们购买了货物意外险，他们对于货物的一切损失和损坏的索赔都可以得到理赔。事实上，保险单的批单部分中除外责任条款修改了保险单，将运输索赔最为常见的原因排除在外。能为你们同样也把近期任何会导致大量索赔的灾难排除在外。

一些保险单仅对货物在共同承运人监管的这一段时间保险。因而，托运人必须确定他们使用的所有运输方式都得到保险，包括承包运输和私人承运，还必须确定保单保险的范围包括从货物离开装运港直到客户手中的全部时间。

由于托运人不容易看到承运人的保单，所以很难确定他们的保单正确无误。承运人一般为托运人提供保险证书作为保险凭证。然而，这些证书包括一个免责声明：如果保险公司没能把保险责任范围的取消或变动通知保险单持有人，承运人不负责。更重要的是，这些证书未表明基本保险单的除外责任条款。除了这些一般的除外责任条款，汽车承运人货物保险单还包括一个标准的除外责任条款“员工不诚实”。基于这个原因，托运人应该坚持业务的所有各方面都应当取得单独的诚信契约。按照伦敦保险协会的终止条款，托运人负责取得一份承运人的费率表以确定他们责任的大小。

Text A

单据的电子交付

在现代社会，单据软件能够用来创建、浏览、发送电子邮件和打印有格式的单据。许多物流单据都能打印。例如，一个方便使用的在线海运提单生成器能够节约时间，立即提供单据。

海运提单的电子提交可以加快贸易融资过程。它可以减少转寄和出示单据的周期。出口方可以更快地得到付款，进口方可以更快地取得货物的所有权。它还可以减少手工制作单据可能发生错误的风险和减少相应成本。

全球运输需要大量单据。在物流服务中，物流单据是必不可少的，主要包括信用证、海运提单、多式联运单据、发票、保险单、检验证书、原产地证书、装箱单、航空货运单、托运人的出口申报单等。

单据是物流管理的一个重要方面。单据的主要特征是准确、完整、简洁和及时。准确性是指物流单据中的细节必须和销售合同中的内容完全一致，不能使用模糊的词汇和短语表达；完整性是指物流单据应该包含所有的细节；简洁性是指物流单据应该避免使用冗长的词汇和短语。为了避免不必要的延迟或误解，物流单据应该及时准备好。

位于不同国家的两个公司所开展的贸易，从签订贸易合同开始。货物的物流运输必须跟各种相关单据文件的传递结合起来。在实际操作中，物流单据在国际贸易中非常重要。

Text B

信　用　证

1．信用证的概念

信用证是基于申请者（进口方）的请求，由开证银行开给出口方的一份书面保证，如果有信用证所列的适当单据，就保证给受益人（出口方）一定数额的支付款。信用证可以缩写为 LC 或 L/C，一般用到的是跟单信用证，缩写为 DC 或 D/C。

阅读信用证时，我们会发现信用证的主要内容包括下列信息：目的地银行、跟单信用证的类型、开立日期和地点、到期日期和地点、申请者、受益人、通知行、要求的单据、货物或服务的描述等。

2．信用证的类型

信用证可以是可撤销的或不可撤销的。无论一份信用证是可撤销的还是不可撤销的，在它的表面都有说明。

可撤销的信用证可以由开证行在没有通知的情况下，在任意时间因任意原因撤销或修改。如果一个对应的银行所参与的交易中使用的是一份可撤销信用证，那么这个银行就作为通知行。可撤销信用证不是被普遍使用的工具，它通常用来为装运提供指示。

如果没有开证行、通知行或受益人的同意，不可撤销信用证不可以撤销或修改。如果所要求的单据都进行了出示，并且贸易术语和条件都一致，那么不可撤销信用证就能确保受益人得到付款。

3．跟单信用证的操作流程

首先，信用证的开立开始于买方指示它的银行以购买金额向卖方开立信用证。然后，买方的银行（即开证行）把信用证寄给卖方国家所在地的对应银行，即议付行或通知行，指出有关信息如信用证的金额、受益人、币种、要求的单据，及其他特殊指示。议付行或通知行一旦收到信用证，就会立即通知到卖方相同信息。卖方与议付行或通知行打交道，并为买方的订单准备好出货。出货之后，卖方把所有相关单据出示给议付行或通知行。最后，当单据完好地提交给议付行或通知行时，议付行或通知行就会向卖方支付货款，并且然后把所有相关单据寄送给买方的开证行，开证行反过来再交给买方，买方最终通过开证行把货款偿还给议付行。

4．跟单信用证业务中使用信用证的好处

由于跟单信用证是通过银行运作的，所以它对信用证的申请人和受益人都是有好处的。对于申请人来说，这是有条件的，款项可以以他的名义基于单据进行支付，单据可以把货物的所有权转移给他。对于受益人来说，他可以向银行索要付款。另外，信用证能够提高进口方信贷和议付的条件，从而也许能够以更低的购买价格和更优惠的条件来议付。

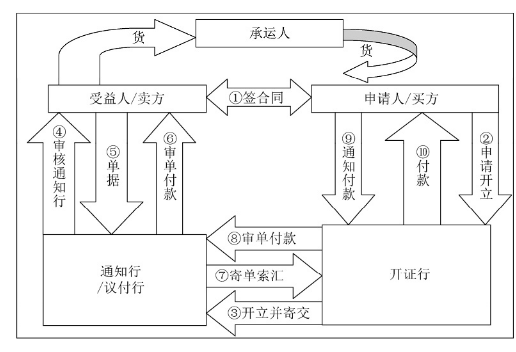


图 10.1　跟单信用证业务下信用证的使用

5．信用证的可转让性特征

信用证通常是可转让的。开证行不仅有义务支付给受益人，还可以支付给由受益人指定的任何银行。可转让的这个工具像货币一样可以由一方自由的交给另一方。为了可转让，信用证内容应包括根据需要或在特定时间内承诺无条件的支付。

被指定的银行顺次就成为信用证的持有者。作为顺次的持有者，它具有信用证赋予的权利，有着良好的声誉，没有任何索赔（的记录）。如果开证行的支付义务延展到了支付给受益人，那么这个交易被看作是直接的议付。如果一份信用证是直接议付，那么它表面会有“我们与您接洽”或“我们也可以”的字样。

6．不符点

对出口方来说，需要记住很重要的一点，跟单信用证的组成部分之一的单据，必须完全符合信用证的规定。如果有任何不符点，银行承担的支付责任将不再承担。常见的不符点的示例如下：

（1）信用证的条款已经到期。

（2）货物的装运延迟。

（3）包装不足。

（4）单据缺失。

出口方应该非常警慎地确保它们与所要求规定的单据完全一致。如果出口方不能满足跟单信用证中的一些要求，他应该寻求进口方修改。否则，即使货物已经装运也有可能得不到货款。在实践中，不符点通常可以通过进口方的同意认可来克服，但是有例外，比如说，一个进口方正在寻找借口不支付，而存在不符点的单据出示刚好给他一个避免付款的机会。

Text C

海 运 提 单

1．海运提单的概念

海运提单是由船运公司或其代理人签发，表明单据中所提到的货物已经收到待运或已经

装到船只的甲板上，并且将货物以收到的次序和状态交付给收货人。

2. 海运提单的功能

海运提单有多项功能。通常，它是货物的收据，是货物的物权凭证和货物合同条款的证明。

海运提单是由承运人开立的收据，表明一批确定的货物已收到待运，或实际上已装船。海运提单作为收据将会显示已装货物的数量和条件、船只的名称、目的港、日期细节等。

海运提单是货物的物权凭证。拥有海运提单在法律上等于拥有了一批货物。海运提单的持有者可以在目的港提取到货物，还可以在运输途中仅靠给提单背书来出售货物。

另外，海运提单的条款提供了对承运人和托运人之间运输合同的证明。海运提单的条款包含运输合同的条款内容。

3. 海运提单的类型

海运提单有多种类型，下面讨论其中几种：

（1）指示提单和记名提单。指示提单意味着承运人在目的港不仅可以把货物交付给指定姓名的收货人，还可以交给由其指定的任意人。指示提单是可以转让的单据。然而，记名提单是不可转让的，不能转移给第三方，所以货物只能交付给指定姓名的收货人。

（2）已装船提单和收货待运提单。前者告知货物已装载好，并且实际已经装上船只。然而，后者是当货物已经进入船运公司的监管，但还没有装上船只的时候，由船运公司签发的。

（3）清洁提单与不清洁提单。清洁提单表明货物接收时是没有毁损，没有不规则（异常）或短缺装运的，收到货物时货物的外表状态是没有缺陷的。与此相反，不清洁提单也被称为肮脏提单和附有条件的提单，与清洁提单是相对的，通常提单上有“包装不良”“安全的印章或封条丢失”等类似字样。

（4）直达提单和联运提单。直达提单意思是货物总是从装运港到目的港都在相同船只上。换句话说，没有发生转运。然而，联运提单包含了货物在运输途中的转运，但是第一承运人作为主要承运人对整个途中各阶段的运输负责。

<table>
<tr><td colspan="3">1）托运人</td><td colspan="3">10）提单号码</td></tr>
<tr><td colspan="3">2）收货人</td><td colspan="3" rowspan="6">COSCO
中国远洋运输（集团）总公司
原件
联运海运提单</td></tr>
<tr><td colspan="3">3）被通知人</td></tr>
<tr><td colspan="2">4）接货地点</td><td>5）船名</td></tr>
<tr><td colspan="2">6）航次</td><td>7）装运港</td></tr>
<tr><td colspan="2">8）卸货港</td><td>9）交付地点</td></tr>
<tr></tr>
<tr><td colspan="6">11）唛头　12）包装与件数　13）商品描述　14）毛重（kg）　15）体积（m^3）</td></tr>
<tr><td colspan="6"></td></tr>
<tr><td colspan="6">16）集装箱或包装的总数量</td></tr>
<tr><td>运费支付</td><td>计费吨/海关吨</td><td>费率</td><td>每一</td><td>预付</td><td>应付</td></tr>
</table>

图 10.2　海运提单样本

续表

预付	到付	17）签发地点与日期
总预付	18）提单签发的份数	
装上船只甲板 19）日期		20）签章

图 10.2 海运提单样本（续）

除了上述几种海运提单外，海运提单的类型还包括全式提单和略式提单等。

4．海运提单的签发

船运公司或其授权的代理人签发提单，而且必须表明签发的提单原件的份数。原件是拥有货物的证明，在表面有“原件”字样。海运提单成套制作，根据特殊交易及进口人的要求，任意数量的复印件都能构成套。一套至少包括两份原件。通常，一式三份原件最常见。

5．海运提单的日期

如果信用证规定了装运的最终期限，海运提单的日期非常重要。因为海运提单会显示货物是否已经及时装船。除非在信用证中有其他规定或除非保险单清楚地规定了上面的日期从装运日起有效，保险单上的日期不能晚于海运提单的签发日期。

6．海运提单的背书

在实践中，有些海运提单可以转让。发货人或收货人可以通过背书转让海运提单。有两种形式的背书：特别背书和空白背书。提单持有者可以通过加上货物交付对象人的姓名把空白背书变成特别背书。

阅读材料

实践中的物流单据

发票是商品的账单并罗列销售的条款。发票也是一种基础单据。它必须完整地体现整批货物，而且它是制作可以根据其进一步产生信息的其他单据的基础。

对在运输途中货物的遭受丢失或毁损，保险单给货物所有者提供补偿。针对不同种类的险别，有不同类型的保险来承保。

装箱单可以显示在发票上，或单独制作，它应该包括逐项商、集装箱的内容及其重量和描述。

原产地证书证明了一批商品的原产地。除了商品贸易委员会，各种其他同业公会也由政府授权可以开立原产地证书。

海运提单不是运输合同，因为它仅由承运人签发。然而，它提供了运输合同的证明。它是货物交付给承运人的收据，还是能够使得货物从托运人转到收货人或任意被背书的其他方手里的物权凭证。

海运提单是传统海运提单的替代单据。海运提单是不可以转让的单据，并且写上指定姓名的收货人，只要出示了适当证明，没有运输单也可以允许其提货。

航空货运单对空运货物来说是一种重要单据。它是货运合同条款结论的证明，并且是货

物收据和运输条件的证明。

货物舱单提供了已装船货物的信息。货物舱单给出了相关运费率、附加费、折扣等。舱单是由承运人的代理人制作的，但是货运代理人在与海关和港口机构打交道时必须持有舱单。

托运单是由托运人签发给承运人要求分得托运舱位。它是托运人要托运货物的委托书，并且是制作海运提单的基础。

交货单由承运人或承运人的代理人开立，能使收货人或收货人的货运代理人前去船只提货。

大副收据由承运人签发，是对货物装船的确认，以后可以用大副收据换取海运提单。当货物已经装上船只，船长签发的收据就被称为货物的大副收据。

码头收据是一种可由港务权威机构签发的，确认在码头或码头仓库收到了待装运的货物的收据。当出口货物被国内承运人送到装货港，并交给国际承运人运往最终目的地时，码头收据被用来转移责任。

重量证书是用来证实货物的重量与提单、发票、保险凭证或其他指定单证中的重量完全一致。如此做的目的是，向买方、卖方、保险公司或其他指定方确认货物在装运时的重量符合相关规定。进口商往往要求出口商出示重量证书，以证实货物在装运时其重量与销售合同相符。

质量证书证实在发货时某批货物的质量和规格与销售合同相符。根据信用证或销售合同中的规定，质量证书可由出口商或有关的政府部门签发。质量证书中的货物描述务必要与其他相关单证，如商业发票、信用证和保险单等单证中的相关条款一致。



Chapter 11

International Logistics



Case Study

A Reliable Partner of P&G[16] on International Logistics

While preparing for a major market **launch** and **penetration** in the US, the world's largest consumer product company, **P&G**, turned to R+L Global Logistics for an international logistics solution.

1. Problem

During the planning phase, P&G discovered that its traditional ocean-based transportation and logistics model could not meet time-critical deadlines. To avoid **outages** on the retailers' shelves, the company needed reliable solutions from a transportation and logistics company with a history of crafting international logistics solutions.

Ensuring that the products arrived in the stores well ahead of the launch date was absolutely essential for marketing success. In addition to the time constraints, the goods would have to be moved efficiently from the Far East to the US and be successfully put into the distribution supply chain without interruption.

In order to resolve the problem, P&G identified five critical requirements of a new logistics provider:

(1) A proven track record of on-time delivery.

(2) A full **complement** of international and domestic logistics services.

(3) A knowledge of product launch for major retail promotions.

(4) Leading edge automation and technology for tracing and tracking shipments.

(5) A sound **reputation** for crafting reliable and flexible logistics solutions in time-critical settings.



2. Solution

As time was running out, P&G turned to one of its minority-owned suppliers, R+L Global Logistics, for help.

Working closely together, the two companies were able to craft a workable solution and deploy the resources necessary to move the goods to the required destinations ahead of the deadlines.

A critical success factor was R+L Global's ability to identify and secure a **fleet** of Boeing 747 freighters, which were chartered to transport the goods from the Far East to the US. R+L Global's

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⑯ P&G　P&G 是 Procter & Gamble 的简称，创于 1837 年，是全球最大的日用消费品公司之一，其产品包括洗发、护肤、化妆、婴幼儿护理用品等。

experience in international shipping enabled them to quickly satisfy the charter requirements by identifying the right airline with the right schedule, at the right price.

Another essential advantage was R+L Global's ability to coordinate directly with the supplier to receive the goods. R+L Global arranged to have the airline pallets built **in compliance with** aircraft **contours** and specifications, and tendered them directly to the Charter operator in order to **expedite** the process.

Upon arrival in the US, R+L Global was responsible for the recovery of the airline pallets, breaking them down, and rebuilding the thousands of loose cartons onto Chep™[17] pallets in order to comply with the customer's **stringent** distribution requirements.

The entire process from the origin airport to the client's distribution center was completed in two days.



Outline

Working in close partnership with the customer, manufacturer, global partners, and airlines, R+L Global was able to meet each of the time-critical deadlines. All of the products were delivered intact and on time for a successful market launch. R+L Global Logistics was rewarded with a "valuable supplier" status by the customer and afforded new opportunities to expand their offerings.

【Key Words】

launch [lɔːntʃ]	*vt.*	发射；开展（活动、计划等）；发动，发起
	vi.	投入，着手进行，热衷于
penetration [peni'treiʃn]	*n.*	渗透；穿透；洞察力
outage ['autidʒ]		断供期，断供
constraint [kən'streint]	*n.*	约束，限制，强制
complement ['kɒmpliment]	*n.*	补充；补足语；补充物
	vt.	补足，补充；补助
reputation [ˌrepju'teiʃn]	*n.*	名气，名声，信誉，荣誉，声望
fleet[fliːt]	*n.*	舰队，船队；车队；港湾，小河
a fleet of		一队
compliance [kəm'plaiəns]	*n.*	服从，听从，柔软度
contour ['kɒntuə(r)]	*n.*	外形，轮廓；（地图）等高线；概要
	vt.	画轮廓
	adj.	显示轮廓的
expedite ['ekspədait]	*vt.*	加快进展，迅速完成
stringent ['strindʒənt]	*adj.*	严格的；迫切的；（货币）紧缩的

⑰ Chep™　Chep 是一家在世界范围内提供托盘与周转箱共用服务的领导公司，在 44 具国家拥有 440 个服务中心。



Text A Concepts of International Logistics

As an emerging industry, international logistics **associated** with the development of international trade has become increasingly broad prospects.[1] Huge array of shippers, carriers, forwarders, businessmen, and so on **facilitate** international transactions, trades, and movement of goods and services. Thereby, international logistics management is facing enormous challenges. The cost of logistics as a percentage of total cost is greater for international ventures, and the complexity of logistics usually increases at a **geometric** rate in the international **arena**.[2]

International logistics—the movement of goods across national boundaries-occurs in the following situations:[3]

(1) A firm exports a portion of a product made or grown, for example, papermaking machinery to Sweden, wheat to Russia, or coal to Japan.

(2) A firm imports raw materials such as **pulpwood** from Canada, or manufactured products such as motorcycles from Japan.

(3) A firm is global in outlook and sees almost all nations as being markets, sources of supply, or sites of assembly operations. [2]

(4) Because of geography, cargo has to be transported through the third country on the way from the export nation to the import nation. Sometimes they are temporarily deposited in the third country, or sometimes they directly cross the borders. Then the cargo remains the fundamental conditions to the import nation. For example, when an inland country is planning to deal with countries which are not **adjacent**, he has to consider the movement of goods crossing his neighbors' borders. [4]



To create customer satisfaction, unnecessary costs must be lowered and efficiency must be increased throughout the trade process. So organizations strive to focus on core competencies and are becoming more flexible. More and more companies choose to **outsource** logistics aspect by partnering with a third-party logistics provider, which can perform the activities better or more cost effectively. [5]



For example, an international **freight forwarder** is an agent who typically arranges cargo movement to an overseas destination. They are capable to **consolidate** and **assemble** small shipments into full loads and then **disperse** them after transport to the point of consumption. This type of companies have **expertise** that allows them to prepare and process the documentation and perform related activities such as space booking, packaging, international insurance, and customs clearance. Although a freight forwarder often acts only as an agent, not as a carrier, it provides nearly all of the services that are important to international trade operations.[6] Whether an exporter /importer is large or small, the weight of the cargo light or heavy, a freight forwarder can take care of the cargo from "dock to door", thus freeing the shippers from dealing with the multitude of logistics-related details.


【参考视频】

【Key Words】

associate [ə'səuʃieit]	*vt.& vi.*	（使）发生联系，（使）联合，结交，结伙
	n.	伙伴，同事，合伙人，相关物，附属物
	vt.	加入，表明支持，把……联系在一起，联想，结交
	adj.	非正式的，准的，副的，联合的，有关联的，合伙的，共事的
facilitate [fə'siliteit]	*vt.*	使便利，减轻……的困难；促进，促使，推进
geometric [dʒiə'metrik]	*adj.*	几何（学）的，几何图案的，成几何级数增加的
	n.	几何，几何体
arena [ə'ri:nə]	*n.*	表演场地，竞技场；圆形运动场，圆形舞台
pulpwood [pʌlpˌwʊd]	*n.*	纸浆用木材
adjacent [ə'dʒeisənt]	*adj.*	与……毗邻的，邻近的
outsource ['autˌsɔ:s]	*vt.*	外购，外包
freight [freit]	*n.*	货运，货物
	vt.	运输，装货于
forwarder ['fɔ:wədə]	*n.*	代运人，运输业者，转运公司
consolidate [kən'sɔlideit]	*vt. & vi.*	（使）巩固，（使）加强，（使）合并，（使）结成一体
assemble [ə'sembl]	*vt. & vi.*	集合，收集，聚合
	vt.	装配，组合，组装
disperse [dis'pə:s]	*vt. & vi.*	（使）分散，散开，散布，散发；传播
expertise [ˌekspə'ti:z]	*n.*	专门知识或技能，专家意见（或鉴定、评价）



【对应翻译】

【Notes to Text A】

[1] As an emerging industry, international logistics associated with the development of international trade has become increasingly broad prospects.

此处“as”是一个介词，意思是“作为”。例如：

As a teacher, I am very aware the characteristics of post-90 students. 作为一名教师，我非常清楚90后学生的特点。

“associated with the development of international trade”是定语从句，修饰前面的主语“international logistics”，整个句子的谓语是“has become”。“be associated with”意为“和……联系在一起；与……有关”。

[2] The cost of logistics as a percentage of total cost is greater for international ventures, and the complexity of logistics usually increases at a geometric rate in the international arena.

“as”引导的介词短语做定语，意思是“作为总成本的一部分”，修饰前面的“the cost”。

“geometric”指“成几何级数增加的”，例如：Population is increasing in that country in a geometric progression. 那个国家的人口正以几何级数增长。

[3] International logistics-the movement of goods across national boundaries-occurs in the following situations:

“the movement of goods across national boundaries”在此处作“international logistics”的同位语，起到解释的作用，并用短横线和前面的主语“international logistics”及后面的谓语“occur”联系。

[4] For example, when an inland country is planning to deal with countries which are not adjacent, he has to consider the movement of goods crossing his neighbors' borders.

“inland country”意为“内陆国”，也可写作“landlocked state”，指没有海岸线的国家，也即被周围邻国陆地领土所包围因而没有出海口的国家，又称陆锁国。

[5] More and more companies choose to outsource logistics aspect by partnering with a Third-party Logistics provider, which can perform the activities better or more cost effectively.

“outsource”是及物动词，意为“外包”，其名词形式为“outsourcing”。外包业是新近兴起的一个行业，企业为维持组织竞争核心能力，将组织的非核心业务委托给外部的专业公司，以降低营运成本，它给企业带来了新的活力。外包有很多种形式，物流外包只是其中一种。

“which can perform the activities better or more cost effectively”是“which”引导的定语从句，修饰前面的“a Third-party Logistics provider”。

[6] Although a freight forwarder often acts only as an agent, not as a carrier, it provides nearly all of the services that are important to international trade operations.

“although”意思相当于“though（尽管，虽然）”，用来引导让步状语从句，它所引导的从句不能与并列连词“but”“and”“so”等连用，但可以和“yet”“still”等词连用。

“it”指的是“a freight forwarder”。

“that are important to international trade operations”是“that”引导的定语从句，修饰前面的“the services”。


【参考答案】

【Exercises to Text A】

Ⅰ. Fill in the blanks.

1. As an emerging industry, international logistics ________ with the development of international trade has become increasingly broad prospects.

2. Huge array of shippers, carriers, forwarders, businessmen, and so on ________ international transactions, trades, and movement of goods and services.

3. More and more companies choose to ________ logistics aspect by partnering with a Third-party logistics provider.

Ⅱ. True or false.

1. The cost of logistics as a percentage of total cost is greater for international ventures. ( )

2. Organizations strive to focus on core competencies and are becoming more flexible, so they all choose to outsource logistics aspect. ( )

3. A freight forwarder acts only as an agent, not as a carrier. ( )

Ⅲ. Translation.

1. 作为一项新兴产业，国际物流是伴随着国际贸易的发展而发展起来的。

2. 国际物流管理面临着巨大的挑战。

3. 国际货运代理是一种主要负责安排货物的运输以到达国外目的地的业务。

4. 货运代理使得托运人从处理大量与物流有关的细节中解脱出来。



Text B The Factors That Influence International Logistics

Extending logistics activities beyond a country's borders represents something more to a company than lengthening its transport distances.[1] International logistics is more difficult than domestic logistics, many factors influence the flow of goods between countries.

Political situations are very important. Friendly countries **negotiate** treaties to increase the flow of business between them. On the other hand, wars and **terrorism** have a **dampening** effect. For example, Iraq war put too much pressure on the world airline industry.

Economic conditions also influence trade patterns. The **devastating** effect of the 2008—2009 world financial crisis has been hard felt in the logistics industry. Global logistics volumes fell dramatically and the financial stability of many large carriers became questionable. Ocean carriers cut significant capacities, airlines reduced flights and road transport carriers were forced to park their fleets in the hope that global trade would **rebound.**[2] The good news is that many experts are **forecasting** a very gradual recovery in logistics volumes now.

The rapidly changing technology influences international logistics, in particular, the changes in computer hardware and software.[3] The significant price reduction for powerful computer equipments have helped bring about better inventory control, better equipment scheduling, more efficient rating of transportation movements, and so on. The technological changes in communications (such as satellite global positioning systems to maintain contact with motor carrier fleets) have helped to improve service quality to the extent that motor carrier companies are now able meet narrowly defined time windows for pickups and deliveries.[4] They also speed up order processing, document flow and improve **accuracy.** The interface between communication technology and computers is another area that has tremendous potential for logistics. These items are just a tip of the iceberg; many other things could be included in this area, such as bar coding and robotics.



Environmental protection issues are also having an impact. Many nations are **enacting** more **stringent** packaging regulations in an effort to increase resource recycling.[5] Aircraft noise restrictions are forcing airlines to retire aircraft from some markets (although they still can be used in some parts of the world). In Europe, automobile manufacturers have to use an emission standard, from Euro I to Euro V，for their vehicles. The automobiles will not be launched to markets without going through professional detections. The norm contributes to

a green environment by reducing harmful gases emissions.

Cultural differences play major roles in transactions. The German businessmen may be very direct and **precise** in price negotiations, whereas the Italian may be very hospitable, but not always **punctual**. Indeed everyone should thoroughly understand and respect different cultural background, religious beliefs, and moral concepts, if he wishes to success in international logistics.[6]

【Key Words】

negotiate [niˈɡəuʃieit] *vt. & vi.* 谈判，磋商，协商，议定，商定，达成协议

vt. 兑现（支票等）；通过，越过（险要路段）

terrorism [ˈterəˌrizəm] *n.* 恐怖主义，恐怖手段，恐怖状态，恐怖统治

dampen [ˈdæmpən] *vt.* 使湿，抑制，控制，减弱（感情、反应）

devastating [ˈdevəsteitiŋ] *adj.* 毁灭性的，引人注目的，令人震惊的

rebound [riˈbaund] *vi.* 弹回，反弹；产生反作用；处于伤心困惑的状态

n. 反弹球，回弹球，复兴，振作

forecast [ˈfɔːkɑːst] *vt.* 预言，预报，预测

n. 预测，预报

accuracy [ˈækjurəsi] *n.* 精确（性），精确（程度），准确（性）

enact [iˈnækt] *vt.* 制定（法律），通过（法案）

stringent [ˈstrindʒənt] *adj.* 严格的，严厉的，（货币）紧缩的，短缺

precise [priˈsais] *adj.* 精确的，准确的，确切的，恰好的，周密的，精细的

punctual [ˈpʌŋktʃuəl] *adj.* 严守时刻的，准时的，正点的

【Notes to Text B】



【对应翻译】

[1] Extending logistics activities beyond a country's borders represents something more to a company than lengthening its transport distances.

"extending"和"lengthening"都是"动词原形+ing"构成的动名词。本句中"extending logistics activities beyond a country's borders"作主语，谓语是"represent"，宾语是"something more"。

"than"构成比较级，注意其前后对比的结构要相似。

该句变成这种形式更易于理解：To a company, extending logistics activities beyond a country's borders represents something more than lengthening its transport distances.

[2] Ocean carriers cut significant capacities, airlines reduced flights and road transport carriers were forced to park their fleets in the hope that global trade would rebound.

"ocean carriers cut significant capacities""airlines reduced flights and road

transport”及“carriers were forced to park their fleets”是3个并列的句子，意为“海运企业大量削减运量、航空公司减少航班、陆运企业被迫停运车辆”。物流业的主要运输方式就是水运、空运和陆运。这些物流运输企业都大幅削减运力，意味着经济形势不容乐观。

“in the hope that global trade would rebound”作状语，其中的“that”又引导了一个定语从句，修饰“hope”。

[3] The rapidly changing technology influences international logistics, in particular, the changes in computer hardware and software.

“in particular in particular”相当于“particularly”意为“尤其，特别”，表示语气或意思的进一步延伸或强化。例句：

The goals and scope, in particular, show you the direction to move. 特别是目标和范围能告诉您下一步工作的方向。

这句话在段首起到提示的作用，表示这段话介绍的是快速发展的技术因素对国际物流的影响。

[4] The technological changes in communications (such as satellite global positioning systems to maintain contact with motor carrier fleets) have helped to improve service quality to the extent that motor carrier companies are now able meet narrowly defined time windows for pickups and deliveries.

maintain contact with　与……保持联系

“that motor carrier companies are now able meet narrowly defined time windows for pickups and deliveries”是一个由“that”引导的定语从句，修饰前面的“the extent”。

全句的主干是“the technological changes in communications have helped to improve service quality to the extent”。

[5] Many nations are enacting more stringent packaging regulations in an effort to increase resource recycling.

“in an effort to”意为“为了达成，为了完成”。例如：

They rebuilt the cinemas in an effort to reach out to the young people. 他们重建了电影院以吸引年轻人。

[6] Indeed everyone should thoroughly understand and respect different cultural background, religious beliefs, and moral concepts, if he wishes to success in international logistics.

本句是一个倒装句，把“if”引导的从句放在句尾，意在强调“了解和尊重不同的、宗教信仰和道德观念”。

【Exercises to Text B】



【参考答案】

Ⅰ. Choose the best answer.

1. International logistics is defined as exporting and importing products (　　) the boundaries of a country.

A. beyond　　B. on　　C. in　　D. of

2. Operating internationally creates different requirement than (　　).

A. to operate domestic　　B. operating domestical

C. operating domestically　　D. operating domesticable

3. In the 2008—2009 world financial crisis logistics companies all hoped that global trade would (　　).

A. rebound　　B. lengthen　　C. add　　D. gain

4. Which does not belong to the application of information technology in international logistics activities? (　　)

A. ERP　　B. VMI　　C. RFID　　D. GPS

5. Which factor would not cause cultural difference in international trade? (　　)

A. religious beliefs　　B. moral concepts

C. language　　D. writing instruments

Ⅱ. Reading and answering questions.

Customer service is a vital component of international logistics management. Each activity of logistics management contributes to the level of service a company provides to its customers. However, transportation' impact on customer service is one of the most significant in international logistics.

There are five transportation modes: motor, rail, water, or pipeline. Certain model combinations are multimodal transportation, including rail-motor, motor-water, motor-air, and rail-water. Such iner-modal combination offer specialized services, with more flexibility, lower cost and so on, than a single transport mode. The third party logistics providers often apply this combination into customized international and domestic service.

Questions:

1. The prime aim of international logistics management is (　　).

A. lower cost　　B. the flow of information

C. customer satisfy　　D. greater efficiency

2. The advantage of multimodal transportation is (　　).

A. size　　B. flexibility

C. varieties　　D. volume

3. Multimodal transportation can be used in (　　) logistics service.

A. international　　B. domestic

C. middle　　D. A and B

Reading Material

Leading Companies Operating in the International Logistics Industry

The leading companies operating in the global logistics industry are specialists in specific areas. For example, UPS and FedEx specialize specifically in global parcel delivery. Other companies, such as CEVA Logistics or C.H. Robinson specialize in supply chains and contract



logistics. Other companies have their strengths in global freight forwarding, such as Expeditors International and Panalpina.

Here are brief introductions to several of them:

1. UPS

UPS is a package delivery company. Every day UPS delivers more than 15 million packages to more than 6.1 million customers in more than 220 countries and **territories** around the world. The company's primary business is the time-definite delivery of packages and documents worldwide. In recent years, it has **extended** its service **portfolio** to include less than truckload transportation (primarily in the U.S.) and supply chain services. UPS reports its operations in three **segments**: U.S. Domestic Package operations, International Package operations, and Supply Chain & Freight operations. U.S. Domestic Package operations include the delivery of letters, documents, and packages throughout the United States. International Package operations includes delivery of letters, documents and packages to more than 220 countries and territories worldwide, as well as shipments from or to the United States with another country as the destination or origin point. Supply Chain & Freight consists of its forwarding and logistics operations and other related businesses.

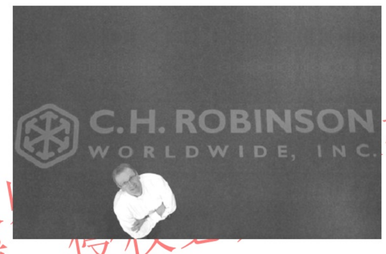


2. FedEx

FedEx Corporation is an American global **courier** delivery services company. It provides a portfolio of transportation, e-commerce and business services under the FedEx brand. The company operates in four segments: FedEx Express, FedEx Ground, FedEx Freight and FedEx Services. Federal Express Corporation (FedEx Express) is an express transportation company, offering time-certain delivery within one to three business days and serving markets. FedEx Ground is a provider of small-package ground delivery service. FedEx Freight is a provider of less-than-truckload (LTL) freight. FedEx Corporate Services, provides its other companies with sales, marketing and information technology support.

3. C.H. Robinson

C.H. Robinson Worldwide, Inc. is one of the world's largest third party logistics providers. The company provides freight transportation services and logistics solutions to companies of all sizes, in a variety of industries. During 2012, C.H. Robinson handled **approximately** 11.5 million shipments and worked with more than 42,000 active customers. It operates through a network of 231 offices. As a part of its transportation services, it provides a range of value-added logistics services, such as supply chain consulting and analysis, freight consolidation, core carrier program management, and information reporting. In addition, it offers two other services: sourcing services (Sourcing) and fee-based information services (Information Services). The Sourcing business is the buying, selling, and marketing of fresh produce. The Information Services consisted of its **subsidiary**, T-Chek Systems, Inc. .




【参考视频】

4. Expeditors International

Expeditors International of Washington, Inc. is **engaged** in the business of providing global logistics services. The company offers its customers a network supporting the movement and positioning of goods. Its services include the **consolidation** or forwarding of air and ocean freight. It also acts as a customs broker, and also provides additional services, including distribution management, vendor consolidation, cargo insurance, purchase order management and customized logistics information. During the year ended December 31, 2010, its airfreight services accounted for 38% of its net revenues; the ocean freight services accounted for approximately 23% of the company's consolidated revenues, and customs brokerage and other services accounted for approximately 39% of the company's consolidated net revenues.



【Key Words】

specifically [spəˈsifikli]	*adv.*	特有地，明确地，按特性地
territory [terətri]	*n.*	领地；领土，版图；领域，范围
extend [ikˈstend]	*vt.*	延伸，扩大；推广；给予；发出（邀请、欢迎等）

	vi.	延伸，伸出，增加
portfolio [pɔːtˈfəʊliəʊ]	*n.*	证券投资组合；公文包；代表作品集
segment [segmənt]	*n.*	环节；部分，段落
	vt.	分割，划分
courier [ˈkʊriə(r)]	*n.*	导游；信使，情报员，通讯员
approximately [əˈprɒksimətli]	*adv.*	近似地，大约地，大致
subsidiary[səbˈsidiəri]	*n.*	附属事物，附属机构，子公司；附属者，附属品
	adj.	附带的，附属的，次要的；助的，帮助的；补足的
engage[inˈgeidʒ]	*vt.*	聘用，吸引住，与……交战
	vi.	从事，与……建立密切关系，衔接，紧密结合
consolidation [kənˌsɒliˈdeiʃən]	*n.*	巩固，合并，联合；变坚固

【Questions】

1. Why the companies such as UPS, FedEx can be the leading parts in the global logistics industry?

2. Can you give more examples of leading international logistics companies?

参 考 译 文

第11章 国 际 物 流

案例分析

宝洁公司在国际物流方面的可靠伙伴

当全球最大的日用消费品公司宝洁公司（Procter & Gamble）准备在美国做一场重要的产品投放市场活动并提高渗透率时，它找到R+L全球物流公司来为其提供国际化物流解决方案。

1．问题

在计划阶段，宝洁公司发现自己原有的以海运为基础的运输与物流模式不能满足时间紧迫的要求。为了避免零售商断货，公司需要一家运输与物流企业来提供可靠的解决方案。

（宝洁公司）已经确定了获得市场成功的关键是在市场投放日期之前刚好能把产品送到商店里。除了时间限制，货物必须有效率地从远东地区运送到美国，并没有耽搁地进入到配送供应链里。

为了解决这个问题，宝洁公司确定了新的物流供应商应具备5个关键要求：

（1）被证实了的能够及时投递的货物跟踪记录。

（2）国际与国内物流服务的有效互补。

（3）为重要的零售促进做产品投放的经验。

（4）领先的尖端自动化和货物跟踪技术。

（5）拥有在时间有限的限制下能提供可靠与灵活的物流解决方案的良好信誉。

2．解决方案

随着时间流逝，宝洁公司转而找到一家它自己少量控股的供应商——R+L全球物流公司，来求得帮助。

两家公司一起密切合作，制定出一个可行的解决方案，并利用了必要的资源赶在截止时间之前把货物运输到要求的目的地。

R+L全球物流公司取得成功的一个重要因素是找出并获得了一批拥有波音747飞机的承运人，它们能把货物从远东运输到美国。R+L全球物流公司凭借其在国际货运中的经验使得这些承运人能够迅速地找到合适的航线并以合适的日期、合适的价格达成租赁要求。

R+L全球物流公司另外一个成功因素是R+L在收货方面直接与供应商协调的能力。R+L安排航空托盘按照飞机轮廓和规格来码放货物，并把这些托盘直接交给包机运营商以加快进程。

货物到达美国后，R+L全球物流公司负责对航空托盘的恢复，把航空托盘上的货拆散，重新把这些数以千计的无托盘纸箱再装上Chep托盘以满足客户严格的配送要求。

从最初的机场到达委托人（宝洁公司）的配送中心，整个货物运送过程仅需两天。

Text A

国际物流的概念

国际物流作为一项新兴产业，是伴随着国际贸易的发展而发展起来的。大量的托运人、承运人、货运代理、商人等协助国际事务、国际贸易及国际商品转移和服务。因此，国际物

流面临着巨大挑战。对于有风险的国际商业来说，物流成本占总成本的比重越来越大，物流事件的复杂性也是呈几何级数递增。

国际物流——跨越国界运输货物的物流活动通常发生在以下情况中：

（1）一家公司出口一批制造或种植的产品，例如，向瑞典出口造纸机，向俄罗斯出口小麦，或向日本出口煤。

（2）一家公司进口原材料，如从加拿大进口纸浆木材，或进口经过制造的产品，如从日本进口摩托车。

（3）一家公司的全球性视野使得它把几乎所有国家看作销售市场、材料的供应来源或装配地点。

（4）由于地理原因，货物在从出口国运往进口国途中要经过第三国。有时货物作短暂的停留，有时则直接通过关境。然后货物基本保持原有状态运往进口国。比如说，一个内陆国打算和不相邻的国家交易，就必须考虑如何让货物穿越邻国边境。

为了客户满意，整个贸易过程中不必要的成本必须削减，效率也必须提高。因此，企业力图集中精力在核心竞争力上，以变得更加灵活。越来越多的公司选择把物流业务外包给第三方物流供应商——这些合作伙伴可以做得更好、成本更低。

例如，国际货运代理公司是一种主要负责安排货物的运输以到达国外目的地的代理人。它们能够把小批量货物汇集成大批，然后整批运输到目的地去后再分开。这类公司拥有专业知识，可以制作和处理单证，从事如订舱、包装、国际保险、报关等相关活动。尽管货代公司通常只是作为代理服务商而不是实际承运人进行操作，它还能够提供国际贸易实务操作中几乎所有重要的服务。无论出口商/进口商规模是大还是小，货物是重还是轻，货代公司都能在“门到门”服务中照管好货物，使得托运人从处理大量与物流有关的细节中解脱出来。

Text B

国际物流的影响因素

对于一个公司来说，将物流活动拓展到国界以外不仅仅意味着延长运输距离这么简单。国际物流比国内物流复杂得多，会有许多因素影响国与国之间货物的流动。

政治因素非常重要。和平友好的国家之间商定条约以促使彼此的商贸活动增加。反过来说，战争和恐怖主义产生相反效果。例如，伊拉克战争时国际航空业承受了巨大压力。

经济形势也会影响交易模式。2008—2009年爆发的全球金融危机就对物流行业产生了极其糟糕的影响。全球物流总量急剧下跌，许多大型承运人企业的经济稳定性变得问题重重。海运企业大量削减运量，航空公司减少航班，陆运企业被迫停运车辆，它们都迫切希望全球经济能快速反弹。一个好消息就是现在许多专家预测物流总量正在逐步地恢复。

日新月异的科技发展也影响国际物流，尤其是在计算机软、硬件方面。计算机设备的降价带来了更好的存货控制、更好的设备调度和更高的运输工作效率等。通信行业的技术革新（如卫星全球定位系统能和行驶中的汽车时刻保持联系）可以将服务质量提高到储如汽车运输公司能在严格限定的时间内拣货和配送这样的程度。这些技术革新还加快了订单处理和单证流转的速度，并且提高了准确率。通信技术和计算机之间的接口技术是物流发展的另一个巨大潜力空间。这些还仅仅是冰山一角，还有很多其他技术可以融入对物流有影响的技术领域里，如条码技术和机器人技术等。

环境保护问题是另一个因素。很多国家致力于增加资源的循环利用，并因此立法制定严格的包装要求。航空器的发动机噪声限制迫使航空公司撤换部分航空器（虽然它们在世界某些地方还在使用）。在欧洲，汽车制造商被要求按照统一的欧Ⅰ到欧Ⅴ排放标准生产汽车。如果不通过专业的检测，汽车将不能投放市场。这样的规定可以促进减少有害气体的排放以保护环境。

文化差异也在这种买卖进程中扮演主要角色。德国商人可能很直接且在价格谈判上很仔细，但一个意大利商人则可能热情好客却不那么守时。实际上，任何一个希望在国际物流运作中取胜的个人或公司，都应该深入了解和尊重不同的文化背景、宗教信仰和道德观念。

阅读材料

国际物流业中的领先公司

在国际物流行业中领先的公司都是在专门领域里的行家。例如，联合包裹服务公司（UPS）和联邦快递（FedEx）擅长于全球包裹运送，而基华物流（CEVA Logistics）和罗宾逊全球货运（C. H. Robinson）则在供应链和合同物流业务中领先。另外，还有如康捷国际（Expeditors International）和泛亚班拿（Panalpina）这样的公司在国际货运代理中占有优势。

下面是一部分知名国际物流公司的简要介绍：

1. 联合包裹服务公司

联合包裹服务公司是一家包裹投递公司。每天该公司在超过 220 个国家和地区为 610 万客户运送 1 500 万个包裹。这家公司的主要业务是包裹和文件在世界范围内的限时投递。最近它也将服务拓展到了零担货运（主要在美国境内）和供应链管理。联合包裹服务公司有三个业务分支：美国国内包裹业务、国际包裹业务、供应链与运输业务。美国国内包裹业务涉及信件、文件、小包裹在美国境内各地的传送。国际包裹业务则涉及信件、文件、小包裹在超过 220 个国家和地区的运送，既包括完全在美国境外运输的货物，也有从美国发到另外一个国家，或从另外一个国家发往美国的货物。供应链及货运业务包括货运代理、物流操作和其他相关业务。

2. 联邦快递

联邦快递集团是一家全球化的投递服务企业。它旗下的众多分支提供运输、电子商务和商业等一揽子服务。公司主要有 4 个分支在运营：联邦快递、联邦地面运输、联邦货运及联邦服务。联邦快递是一家快递运输公司，提供一到三个工作日内有时效限制的航空投递服务。联邦地面运输是提供小包裹地面运输服务的公司。联邦货运则是提供零担货运（LTL）的企业。联邦服务向集团内部其他公司提供销售、营销及信息服务的支持。

3. 罗宾逊全球货运

罗宾逊全球货运有限公司是世界上最大的第三方物流公司之一。公司向多个行业中的不同类型公司提供货物运输服务及物流方案。2012 年，罗宾逊全球货运公司处理了大约 1 150 万吨货物，向超过 42 000 家活跃客户提供帮助。该公司在全球有 231 家办事处。作为运输服务的一部分，该公司提供一系列的物流增值服务，例如供应链咨询与分析、货物集运、核心承运人项目管理及信息报告。此外，该公司还提供两种服务：采购和以支付为基础的信息服

务。采购业务是针对新鲜农产品的购买、销售及市场营销。信息服务则由该公司旗下一家子公司“T-Chek 系统”来完成。

4. 康捷国际

康捷国际物流公司主要从事全球化物流业务。该公司向客户提供货物运输与定位的网络化支持。它的服务包括航空或海运货物的集货或代理。它还可以报关，另外提供附加服务，包括配送管理、卖方集货、货物保险、订单管理及定制化的物流信息。2010年度，空运业务占到了该公司净收入的38%，海运业务占到了23%，代理报关和其他服务占到了大约39%。



Chapter 12

Logistics Business Correspondence



Case Study

Specimen Letter about Claim for Improper Packing

Dear Sirs,

We refer to Sales Contract No.333 covering the purchase of 200 coffee sets. The **consignment** arrived here on July 22. On examination, we found 16 sets were badly damaged though the packages containing the coffee sets appeared to be in good condition.

Considering this damage was due to the rough handling by the shipping company, we claimed on them for the loss, but an investigation made by the surveyor has revealed that the damages are **attributable** to improper packing.

On the strength of the survey report, we hereby register our claim against you as follows:

CIF value of 16 sets: US $ 350.00

Inspection fees: US $ 250.00

Total: US $ 600.00

We enclose one copy of survey report No. SR1101 and look forward to your early settlement.

Yours truly,

(Signature)

【Key Words】

consignment [kənˈsainmənt] *n.* 托运的货物；托运；托管

attributable [əˈtribjətabl] *adj.* 可归因于……的；由……引起的

signature [ˈsignətʃə(r)] *n.* 签名；署名；识别标志，鲜明特征



Text A Introduction to Logistics Business Correspondence



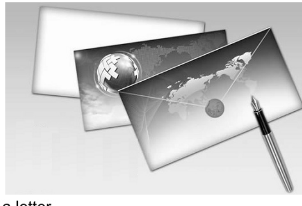
【知识拓展】

A business **correspondence** is a letter written in formal language, usually used when writing from one business organization to another, or for correspondence between such organizations and their customer, clients and other external parties. As an important part of business contact, the business letter plays a key role in all kinds of business activities, so does in logistic organizations. <u>Generally speaking, there are nine parts of the logistics business letter as follows:</u> [1]

(1) Heading—heading includes the sender's name, postal address, post code, telephone number, fax number and e-mail address, etc. .

(2) Date—the date line is used to indicate the date the letter is written.

(3) Inside address—the inside address is the recipient's address.



(4) **Salutation**—the most commonly used salutation forms are "Dear Sirs", "Gentlemen" or "Dear Madam".

(5) Subject line—subject line is actually the central idea of a letter, it is inserted between the salutation and body.

(6) Body—this is the most important part of a letter.

(7) **Complimentary** close—this part is used to provide the latter a courteous.

(8) Signature—the signature is the signed name of the person writing the latter. It is signed by hand in black or blue ink.

(9) **Enclosure**—if it is necessary to enclose any document along with the letter, such as a brochure, attention should be called to it by writing "Enclosure", "Enclosures" or " Encl.", below the signature in the lower left-hand corner.

Specimen Letter

Allen Incorporation
1470 St. Louis Street
Los Angeles, CA 90015
U. S. A
March 15, 2015

China National Import & Export Corp.
Shanghai Branch
Shanghai
China

Subject: Order No. 8 for Tools

Gentlemen,

This is to inform you that Mr. White, **president** of ABC logistics Inc. **resigned** from that company and **established** a new company under the name of Allen Inc. .[2] We are pleased to place with you our first trial order as enclosed, which we hope, would lead to good business relations between our two companies.[3]

Please fax your sales **confirmation** with net price on CIF Los Angeles basis. [4]

We are looking forwards to replying sooner.

Yours sincerely
Allen Inc.
James Smith
(Signature)

【Key Words】

correspondence [ˌkɔrisˈpɔndəns]	*n.*	信件，函电，通信，一致
salutation [ˌsæljuˈteiʃən]	*n.*	招呼，致意，信函中的称呼语
complimentary [ˌkɔmpliˈmentəri]	*adj.*	表示敬意的，赞美的，赠送的
	adv.	崇敬地，赞美地，赞许地
enclosure [inˈkləuʒə]	*n.*	围绕，附件，装入物
president [ˈprezidənt]	*n.*	董事长，总裁，院长，主席
resign [riˈzain]	*vt.&vi.*	辞职，放弃
establish [isˈtæbliʃ]	*vt.*	建立，成立，安置，创立
confirmation [ˌkɔnfəˈmeiʃən]	*n.*	证实，证据，确认

【Notes to Text A】


【对应翻译】

[1] Generally speaking, there are nine parts of the logistics business letter as follows.

物流商务信函的 9 个部分为：信头（heading）、日期（date）、信内地址（inside address）、称呼（salutation）、事由（subject line）、正文（body）、结束敬语（complimentary close）、签名（signature）和附件（enclosure）。

[2] This is to inform you that Mr. White, president of ABC logistics Inc. resigned from that company and established a new company under the name of Allen Inc. :

在国际商务活动中，常见的职衔如下：

（1）president, chairman	总裁，董事长
（2）general manager	总经理
（3）deputy general manager	副总经理
（4）executive vice president	执行副总裁
（5）HR manager	人力资源经理
（6）project manager	项目经理
（7）logistics manager	物流经理
（8）sourcing director	采购主管

[3] We are pleased to place with you our first trial order as enclosed, which we hope, would lead to good business relations between our two companies.

短语“to place with you our first trial order”中介词 with 提前，常见的短语为“to place an order with sb.”（向某人）订货，例如：

to place a trial order with sb.	（向某人）试订货
to place a repeat order with sb.	（向某人）继续订货
to place a substantial order with sb.	（向某人）大批订货

句中“which”引导非限制性定语从句。

[4] Please fax your sales confirmation with net price on CIF Los Angeles basis.

在商务活动中表示价格的词组与贸易术语：

（1）一些常见表示价格的词组。

net price	净价
lowest price	最低价
reasonable price	合理价
prevailing price	现行价

（2）CIF 为国际贸易术语，常见的 6 个国际贸易术语。

EXW (Ex Works)	工厂交货
FCA (Free Carrier)	货交承运人
FAS (Free Alongside Ship)	船边交货
FOB (Free on Board)	船上交货
CFR (Cost and Fright)	成本加运费
CIF(Cost, Insurance and Freight)	成本、保险和运费

【Exercises to Text A】


【参考答案】

Ⅰ. Fill in the blanks.

1. This is to inform you that Mr. White, president of ABC logistics Inc. resigned ________ that company and established a new company under the name of Allen Inc. .

2. We are pleased to place with you our first ________ order as enclosed.

3. Please fax your sales ________ with net price on CIF Los Angeles basis.

4. Our quotation ________ 20 tons of Shandong groundnuts is valid for 10 days.

5. Please extend your L/C to August 15 and August 31 ________ shipment and negotiation respectively.

Ⅱ. Translation.

1. 我方现附寄一份价格单，供你方参考。

2. 如你方需要进一步的信息资料，请传真给我们。

3. 我是物流公司的采购主管，希望向贵公司大量订货，以此建立两公司的业务关系。

4. 我为一家零售商负责供应链管理，这家零售商有 150 个零售店，2 个配送中心，我的任务是在今后的 5 年里建立一个最佳供应链，以满足顾客的需求。

Ⅲ. Writing.

1. Read this part of a letter your boss has received from Ms. Miller, a conference organizer.

I am writing to ask if you would attend a seminar on 27 March and give a speech on business issues.

Accommodations and the use of a car will be provided.

If you could come, please confirm the subject of your speech and standard of accommodations you would need.

I am looking forward to hearing from you.

Your boss has asked you to reply to the letter.

2. Write a letter to Ms. Miller.

The letter should include the following points:

(1) Accepting the invitation.

(2) Giving out the subject of your boss's speech.

(3) Explaining why your boss is interested in this subject.

(4) Reserving a hotel room.

Write about 150 words.

Text B Establishing Business Relations

A letter to establish business relations is a piece of writing to find and **negotiate** with a new business partner, it is the first step for a logistics company to expand its business.[1] In order to enter into business relations, a logistics company will find the **channels** as followings to obtain a new customer's the name and address:



(1) The bank.

(2) The **chamber** of **commerce**.

(3) The Commercial Counselor's **Office**.

(4) The **fair**.

(5) Introduction carried on by friend.

(6) Advertisement.

Specimen Letter

Dear Sirs,

We have obtained your name and address from the Commercial Counsellor's Office of your

embassy in London and are now writing you for the establishment of business relations.[2]

We are a very famous logistics Co., Ltd. in China and are willing to **act as** your **forwarding** or shipping agent as well as the agency carrying stock.[3] We would like to work with you to market them here. Our **reference** is the Bank of China in China. They can provide you with information about our business and finance.

We are looking forward to your early reply.

Yours sincerely

Lucy

【Key Words】

negotiate [niˈgəuʃiˌeit]	*vi.*	谈判，协商，洽谈
	vt.	通过谈判达成，谈成
channel [ˈtʃænl]	*n.*	海峡，通道，渠道，途径，频道
chamber [ˈtʃeimbə]	*n.*	房间，会议厅，会所，议院
commerce [ˈkɔmə(:)s]	*n.*	（尤指国际的）贸易，商业，商务
Commercial Counselor's Office		商务参赞处
act as		担任
forward [ˈfɔ:wəd]	*adv.*	向前，前进，提前
	adj.	向前方的，向前进的，未来的，预约的
	vt.	发送，转寄，促进，转投
	n.	（足球、曲棍球等的）前锋
reference [ˈrefrəns]	*n.*	参考，参考书目，证明书，证明人
	vt. & vi.	引用，附……以供参考，访问

【Notes to Text B】



【对应翻译】

[1] A letter to establish business relations is a piece of writing to find and negotiate with a new business partner. It is the first step for a logistics company to expand its business.

"to find and negotiate with a new business partner"动词不定式作目地状语。

"it"为指示代词，代替"a letter to establish business relations"。

[2] We have obtained your name and address from the Commercial Counsellor's Office of your embassy in London and are now writing you for the establishment of business relations.

"to obtain one's name and address from"意为"由某处得知某人的姓名和地址"。

还可以表示为：

to have/learn /know one's name and address from…

to owe one's name and address to…

to obtain one's name and address through (by) courtesy of…

"to establish business relations with…" 意为"和……建立商务关系"。

还可表示为"to enter into business relations with…"，例如：

We are willing to establish business relations with you on the basis of equality and mutual benefit. 我们愿在平等互利的基础上与贵方建立商务关系。

[3] We are a very famous logistics Co., Ltd. in China and are willing to act as your forwarding or shipping agent as well as the agency carrying stock.

（1）表示公司和企业的专用词组：

Co., Ltd.	有限公司
a multi-national corporation	跨国公司
a joint venture	合资企业
a state-owned enterprise	国有企业
a foreign capital enterprise	外资企业

（2）物流公司承担的代理：

forwarding or shipping agent	运输代理
agency carrying stock	仓储代理
international freighter forwarder	国际货运代理

【Exercises to Text B】

【参考答案】

Ⅰ. Fill in the blanks.

1. We are a very famous state-owned enterprise ______________________________.
从网上得知贵公司的地址和名称，我方愿和你方建立贸易关系。

2. We are given to understand that ______________________________.
贵公司有意在平等互利的基础上与我公司建立业务关系。

3. We take liberty to write to ______________________________.
请求担任你方在中国的运输代理。

4. We should be greatly obliged ______________________________.
如能尽快航寄贵公司有关价格的详细资料。

5. We are glad to inform you that ______________________________.
我方能够提供各项售后服务以满足贵方需要。

Ⅱ. Reading and answering questions.

Ocean freight rates may be broadly divided into tramp rates and liner freight rates. Tramp rates fluctuate with the market conditions of supply and demand. In a boom period, the tramp rates rise; in a period of recession, they decline. Liner freight rates are fixed by shipping conferences and other liner operations. They are related more to the costs of operation that remain comparatively steady over a period time.

Freight forwarders are mainly concerned with liner freight rates. Although the

principles on which the liner freight rates are fixed have not been clarified by shipping conferences or operations, it is evident that the cost of providing such services will cover actual cost and a margin of profit. The total cost of providing such services consist of fixed costs and variable costs. Fixed costs include costs, interest, and depreciation. Variable costs involve cost of fuel, loading and unloading expenses, and port costs.

When determining the freight rate, a carrier will also consider the stowage factor, distance, And the age-old principle of what the traffic can bear.

In fact, the principle of what the traffic can bear in effect means that commodities that are highly rated subsidize those that are rated lower. This principle was more commonly adopted in the past than the cost of service principle because of the problems involved in the computation of the actual unit costs. However, containerization with standardized cargo units has made the calculation of the service cost per unit easier than heterogeneous break bulk cargoes. The carriers are therefore increasingly adopting the service cost principle nowadays, particularly with a view to fighting competition.



Open market rates are also taken into account. When commodities are moved in large quantities and are susceptible to charter competition, the rates may be left "open" so that a liner has the option of charging whatever is considered appropriate in the competitive situation.

Liner rates are also subject to surcharges or adjustment factors that may be levied from time to time in order to enable the shipping lines to meet certain price variations in their inputs such as a currency adjustment factor (CAF), a bunker adjustment factor (BAF), and port congestion surcharges.

Container freight rates generally include charges for inland haulage and terminal charges at the port of loading and port of discharging. There are different types of container freight rates.

Commodity Box Rates (CBR) is a lump sum rate for the carriage of a container loaded with a particular commodity. The rate is based on the average utilization of the box. For the carrier, the rate simplifies calculations and reduces administrative costs. Large shippers prefer CBR for particular voyages, but it is not suitable for small shippers.

Freight All Kinds(FAK) Rates is the alternative to the commodity box rate and is based on the principle that what goes into the container is irrelevant to the freight which should be charged. In other words, all commodities are charged the same rate for the same voyage regardless of their value. The FAK rate is logical since it is the container that is loaded and unloaded and occupies space on hand a vessel.

Questions:

1. Which of the following statements are true about liner freight rates? (　　)

A. They fluctuate with market conditions of supply and demand.

B. Liner freight rates are fixed by shipping conferences and other liner operator.

C. They are related more to the costs of operation.

D. Freight forwarders are mainly concerned with tramp rates.

2. What do fixed costs include? (　　)

A. Cost of officers and crew

B. Insurance, repairs and maintenance.

C. Cost of fuel, loading and unloading expense

D. Administrative costs, interest, and depreciation

3. Which of the following do variable costs and involve? (　　)

A. Administrative costs　　B. Cost of officers and crew

B. Cost of fuel　　D. Loading and unloading expenses

4. Line rates are also subject to surcharges or adjustment factors such as (　　).

A. currency adjustment factor　　B. port congestion surcharges

C. bunker adjustment factor　　D. stowage factor

5. Which of the following are true about Commodity Box Rates? (　　)

A. All commodities are charged the same rate for the same voyage regardless of their value.

B. It simplifies calculations and reduces administrative costs.

C. The rate is based on the average utilization of the box.

D. It is a lump sum rate for the carriage of a container loaded with a particular commodity.

Ⅲ. Translation.

我方2015年8月12日第188号函，曾请你报来运输电冰箱的报价。如果你方尚未发出该项报价单，请尽快航寄。事实上，我方现已收到其他供货人的报价单，出于对你方的考虑，请速报，以免失去合作机会。

如贵方能利用这一时机，为双方的合作铺平道路，则我们之间的贸易前景是十分广阔的。

Ⅳ. Writing.

1. Read this part of a letter from Mr. White, the conference organizer.

We have pleasure in inviting you to our annual conference to be held at the Hilton Hotel here in Los Angeles, from 10 to 15 October, 2015.

Details of the conference, accommodation arrangements and a provisional program have been enclosed.

Last year you gave a very interesting presentation on the subject of “Major Principles of

Logistical Management". We would be very grateful if you could consider giving us an update on this.

Please confirm your participation at your earliest convenience.

2. Write a letter to Mr. White.

The letter should include the following points:

(1) Referring to the invitation.

(2) Confirming your participation.

(3) Requesting more information about the program.

(4) Apologizing and giving reason for not being able to give another presentation.



Reading Material

Response to the Complaints and Claims

Excellent service is a vital factor for a logistics company to gain success, however, sometimes the customers may complain and claim for improper packing late delivery or inferior quality, etc. . How will you respond to the customer's complaints and claims?

Specimen Letter

Dear Sirs,

Thank you for your letter of 22 June, 2015. Your complaint and claim about shortage of 3 boxes has been noted.

We have contacted our forwarding agent who informs us that your three boxes were over-carried and landed in Shenyang.

We are making arrangements to have the three boxes of tape recorders returned to Tianjin by the first available opportunity and we will bear any charges and expenses thus incurred.

As to the cables you referred to for computer-connection, they can be provide as an optional extra and were not quoted to you. In this instance, due to the misunderstanding, we would be please to provide you at no charge,and you will have them together with the next shipment under the S/C No. BP 188.

Please accept our apologies for the inconvenience caused to you.

Yours truly

(Signature)

【Key Words】

over-carried		运过；超载
opportunity [ˌɔpəˈtjuːnəti]	*n.*	机会，良机；有利的环境
computer-connection		计算机连接
misunderstanding [ˌmisʌndəˈstændiŋ]	*n.*	误解，误会；不和
S/C		Sales Confirmation 的缩写，即销售合同

【Questions】

What is the best way when dealing with the complaints from customers?

参 考 译 文

第 12 章　物流商务函电

案例分析

因包装不当提出索赔的样信

亲爱的先生们：

我们收到第 333 号销售合同项下的 200 套咖啡具。这批托运货物已于 7 月 22 日运达。我们在检查货物时发现其中 16 套咖啡具外包装虽然良好，但咖啡具损坏严重。

考虑到这一损坏可能是由于运输公司粗鲁搬运造成的，我们已向运输公司提出了索赔要求，然而，鉴定人调查后发现咖啡具的破损是由于包装不当造成的。

凭检验报告，特向贵方提出如下索赔：

16 套咖啡具 CIF 价：350 美元

检验费：250 美元

合计：600 美元

随信附上第 SR1101 号检验报告复印件一份，盼早日理赔。

真诚的

（签名）

Text A

物流商务函电概述

商务函电是指商务往来的企业之间、企业与客户之间或与外部企业之间用正式的语言进行的信函往来。作为商务沟通的重要组成部分，商务信函在所有的商务活动中扮演着重要的角色，在物流企业的商务活动中也是如此。一般来说，物流商务信函包括以下 9 个部分：

（1）信头——信头包括发信人的姓名、地址、邮编、电话号码、传真号码、邮编号码和电子邮件地址等。

（2）日期——日期行主要用来显示信函的书写日期。

（3）信内地址——信内地址就是指收信人地址。

（4）称呼——常用的称呼有“Dear Sirs”“Gentlemen”或“Dear Madam”。

（5）事由——事由行实际上是一封信的中心思想，位于称呼和正文之间。

（6）正文——这是商务信函最重要的一个部分。

（7）结束敬语——仅是信函的一个礼貌结尾。

（8）签名——签名是写信人所签的名字。它由黑色或蓝色墨水手写。

（9）附件——如需随信附寄的文件，如“小册子”，则必须在左下角的签名下写上“Enclosure”“Enclosures”或“Encl.”，附在签名下的左下角。

样信

Allen 公司
美国洛杉矶圣路易街1470号
中国上海中国进出口总公司上海分公司
2015年3月15日
采购工具的第8号订单

敬启者：

兹通知贵方，ABC物流公司的总裁White先生已从该公司离职，创建了以Allen命名的新公司。我方很高兴与贵方下初订单，初订单随信附上，以此促进我们俩公司的业务关系。

请电传贵方销售确认书及成本、保险加运费至洛杉矶的净价。

我们期盼您早日回复。

真诚的
Allen 公司
詹姆斯·史密斯
（签名）

Text B

建立商务关系

建立商务关系信函是指为实现找到客户并进行商务往来而写作的信函，这是物流公司拓展业务的第一步。物流企业可从以下渠道获知其他公司的地址和行名，写信给新客户以建立业务关系：

（1）银行。
（2）商会。
（3）商务参赞处。
（4）展览会或商品交易会。
（5）朋友介绍。
（6）广告。

样信

敬启者：

我方从贵国驻伦敦大使馆商务参赞处得知贵公司行名和地址，现寄上此信以期盼与贵方建立商务关系。

我公司是中国著名的物流有限公司，想担任贵公司在我地区的运输代理和仓储代理，共同拓展市场。我方资质证明人为中国银行，它可以向贵方提供有关我方的业务和财务情况。

期盼早日答复。

真诚的
露西

阅读材料

申诉与索赔的答复

优质服务是物流企业成功的重要因素，然而，有时企业也会碰到客户因不当包装、延迟送货、产品质量低劣等引起的投诉。该如何应对客户的申诉与索赔呢？

样信

敬启者：

感谢您 2015 年 6 月 22 日的来信。贵方因短少 3 箱货物的投诉与索赔引起了我方的关注。

通过与我方运输代理商联系，获知这 3 箱货物因运输运过了，装卸在了沈阳。

我公司现正安排在第一时间将这 3 箱录音机货物运回天津，期间所发生的所有费用当由我方承担。

至于贵方提到的用于连线计算机的电缆线，它们是作为另选配置提供，不包括在报价中。由于这件事是运输代理商误解造成的，我方愿免费提供电缆线，并将同销售合同第 BP 188 项下的下一批货物一起运给贵方。

对由此给贵方造成的不便，深表歉意。

真诚的

（签名）

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